



IPHE ILC SCOPING PAPER

REGULATIONS, CODES AND STANDARDS

- History of different versions
- Consultations in addition to IPHE PoC
- Structure and contents of scoping paper
- Proposed Next steps
- Questions to resolve
- EC contribution

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RCS Scoping Paper Lead*



History of different versions

- version 1: prepared by German IPHE Delegation
- ILC Reisenburg (March 2004) EC accepts to take over
- version 2: September 2004
 - prepared for ILC Reykjavik meeting - not presented
- dedicated meeting linked to *first-ever IPHE workshop* Ulm:
 - discussion between EC, US, D
 - agreed schedule for completion of RCS scoping paper
 - version 2b: US comments to version 2
- version 3: November 2004 for submission to PoC (incorporating comments to version 2 and 2b)
 - commented by EC services
 - commented by ILC co-chair
 - phone conference with ILC co-chairs
 - comments by some PoC
- version 4: "final"

comments to versions 2-4

Regulations, Codes and Standards		
Australia	John Henry	
Brazil	Sergio Pinheiro de Oliveira	
Canada	Ian MacIntyre	
Germany	Franck Gröschl Christoph Albus	
Iceland	Agust Agustsson Tryggvi Axelsson	
Italy	Romano Borchellini	
Japan	Kazuo Koseki Kazuyuki Narusawa	
Norway	Ståle Selmer-Olsen	
Republic of Korea	Sung Ho Shin	
United States	Pat Davis Duane Pfund	
European Commission	Marc Steen (lead author)	

Missing: China, France, India, Russia, United Kingdom

Repeated reminders, secretariat and ILC co-chairs in copy



Non-IPHE Member Consultations to version 2

FCTESTNET

EU HFP - IG RCS

HarmonHy

IEA- ExCo Advanced Fuel Cells

ISO-TC 105

Canadian FC Council

FC Council Europe

Input to RCS PoC:

EU HFP Initiative Group RCS - ToR
Contains explicit reference to IPHE



Structure of Scoping Paper

- Introduction
- Basic Considerations guiding IPHE involvement in RCS
 1. Provide added value: identify gaps, provide forum for facilitating progress towards RCS and safety protocols
 2. IPHE no funding, nor mandate for drafting standards and regulations
 3. Forum for discussing issues and forwarding recommendations to policy- and decision makers
 4. Catalyst for cooperation and facilitator of harmonisation of RCS activities - not prescriptive in *how?*, but in *what?* and *by when?*
 5. Expert Group(s): see later
 6. Implementation of through existing mechanisms and instruments



Nature of possible IPHE work

Main focus: pre-normative and pre-regulation research issues

Types of activity:

- defining and prioritising needs
- identifying complementarity in ongoing activities of IPHE members
- setting scope for cooperation
- sharing and discussing research results
- identifying channels and bodies for exploitation of research results and further development of RCS
- exploiting lessons learned from demonstration projects

Preferred tool: IPHE workshops



Classification of proposed areas for collaboration under IPHE

Mobile applications: road vehicles, other

Stationary applications

- hydrogen vs. electricity
- variety of size, technology, specific application requirements
- supply, transport, distribution, storage

energy-policy drivers: supply security, climate change - long term perspective

Portable applications

commercial drivers, shorter-term

Safety considerations

public concern, perception and acceptance



Proposed Next Steps

mobile: survey of approval procedures	Feb. 2006
stationary: id.	Feb. 2006
portable: further consideration of need for IPHE-ILC work	
safety: organisation of workshop	Sept. 2005
"Meta-gap analysis" exhaustive coverage of	Dec. 2006
• regulations, codes, standards	
• across H2 production, delivery, storage, use	
• existing, under development, needed to be developed	
Glossary of terms, definitions, ...	Dec. 2005



ICHS (HySafe)-IPHE Conference Pisa, 7-10 September 2005

- mentioned in version 2
- notification mid-December 2004
- proposal to HySafe Coordination Committee: 17 Jan.
- discussed in Coordination Committee 18-20 Jan: principle agreement
- 8 Feb.: Organising Committee meeting
 - *next announcement, extension abstract submission date, logo*
 - *IPHE membership to Organising Committee (Japan already expressed interest)*
- IPHE SC to endorse





Questions to resolve

Assignment of tasks and responsibilities: PoC, Secretariat, other? (linked to Canadian comment)

Expert Groups

- *first mentioning in Beijing Action Plan*
- *expert group = IPHE PoC:*
 - *no added value*
 - *no experts for full application range of RCS*
 - *workshop in Ulm October 2004*
- *in overall scoping paper: "Task Groups"*

Mandate of PoC and Scoping Paper Leads?



EC Contribution

Through EU Hydrogen and Fuel Cell Platform

www.hfpeurope.org



Glossary

EC projects eligible for feeding into IPHE - RCS:

FCTestNet, HySociety

HarmonHy, Eledrive, EIHP, HySafe, ...

HyApproval, ...



Measures for codes, standards and regulations for safe (and efficient) deployment of hydrogen in European Union

Recently submitted proposal: FCTesQA

- entities from US, China, Russia, Japan, Korea as member of consortium
- IPHE mentioned in proposal formulation



Thank you and to all contributors!

any questions?

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