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INQUEST

Information Network on Quiet European road Surface Technology

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INQUEST Final Activity Report





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1. Project execution

1.1 Objectives

The project aims at coordinating communication and dissemination of past and present research pertaining to guidance on the use of low-noise technologies for road surfaces to European countries with less access and experience in applying knowledge in that field. One of the main instruments is the dissemination of the contents of the Guidance Manual developed by SILVIA (“Sustainable Road Surfaces for Traffic Noise Control”, a European-funded project completed in August 2005) by means of a series of workshops in countries that were not involved in SILVIA, with priority given to new member states.

One of the main outputs of SILVIA is a proposed acoustic classification procedure for road surfacing materials and technologies. A complementary objective of the INQUEST project is to promote European harmonisation of testing methods and equipment for this purpose. To that end, one has to set up a European network of users of the measurement methods involved in the classification procedure in order for them to exchange experience and data and to organise equipment comparison tests. It is noted that these tests are not proposed as part of the project.

1.2 The dissemination workshops

The organization has been planned at the project kick-off meeting held in Brussels on June 28th, 2006.

Coordinated presentations have been developed and a “standard workshop programme” has been designed wherein the hosting country has the opportunity to present their views and to take part in a closing discussion. Here is the programme:

- | | |
|-------|--|
| 9:00 | 1. Welcome address by local host * |
| 9:15 | 2. Presentation on “domestic issues ** |
| 9:40 | 3. Introduction to INQUEST and SILVIA including relevance of programme, namely to the END (G. Descornet) |
| 10:05 | 4. The road surface and traffic noise (G. Descornet) |
| 10:30 | BREAK |
| 10:45 | 5. State-of-the-art of low-noise surfaces (H. Bendtsen) |
| 11:10 | 6. Noise measurement methods and certification procedures (G. Descornet) |
| 11:35 | 7. Experimental surfaces and future prospects (H. Bendtsen) |
| 12:00 | LUNCH |
| 13:30 | 8. Interaction of low-noise surfaces with other control measures (H. Bendtsen) |
| 13:55 | 9. Classification, labelling and COP, including prediction models and mapping (P. Morgan) |
| 14:20 | 10. Cost-benefit analysis (H. Bendtsen) |



- 14:45 **BREAK**
- 15:00 **11. Summary and Presentation of the Guidance Manual (P. Morgan)**
- 15:25 **12. Presentation on national projects ****
- 15:50 **13. Other relevant European and International projects (P. Morgan)**
- 16:15 **14. General feedback from the audience / panel discussion**
- 16:45 **15. Evaluation and closing statements ***
- 17:00 **CLOSURE**

* *Up to the host to do.*

** *At the discretion of the host.*

The FEHRL team have launched a call for participation to their member institutions in the countries that were not involved in the SILVIA project. Seven positive replies were received in appropriate time, namely from Spain, Slovenia, Switzerland, Portugal, Romania, Greece and Czech Republic.

The presentations have been each time updated/upgraded according to the feedback received from previous events. In total, ten presentations of 20' each have been delivered at each workshop. The PowerPoint presentations have been supplied to the local organizers in advance so that they could deliver them to the participants either as printouts or as a CD-ROM. The presentations include notes summarizing each slide so as to allow the participants to keep a full record of the lectures. It would also help those of them not too familiar with the English language to retrieve any information missed from the oral presentation.

An evaluation form has been distributed to the participants for them to rate the different aspects of the workshop (quality of presentations, interest of discussion, quality of documents provided, length of workshop) and to make comments on the subjects presented.

Six dissemination workshops have taken place:

<i>City</i>	<i>Country</i>	<i>Local organizers</i>	<i>Date</i>	<i>Number of participants</i>
Ljubljana	Slovenia	ZAG	21 November 2006	25
Bucharest	Romania	CESTRIN	24 May 2007	43
Dübendorf	Switzerland	EMPA & LAVOC	14 November 2007	23
Brno	Czech Republic	CDV	23 November 2007	25
Lisbon	Portugal	LNEC	3 December 2007	48
Athens	Greece	NTUA & KEDE	14 March 2008	136

In addition, two members of the INQUEST team, namely H. Bendtsen (DRI) and G. Descornet (BRRC) had accepted the invitation of CEDEX (Spain) to present a selection of topics from SILVIA in the frame of their "*Jornadas Tecnicas – Incidencia de la capa de rodadura en la*



reduccion del ruido del trafico en carreteras”, Madrid, 2-3 October 2006. However, this is not to be considered as a formal INQUEST event¹, just as an extra dissemination effort.

Tables 1 to 4 hereafter summarize the evaluation of the workshops by the participants (bold numbers are total number of answers collected from the 6 events):

Table 1 - Rating of the workshop on the following criteria:

	1	2	3	4	5	
Boring	0	1	19	45	45	Interesting
Simple	5	13	28	45	18	Challenging
Time too long	0	10	72	17	11	Time too short
Learned little	1	5	28	49	26	Learned a lot

Table 2 - Rating of the following elements of the workshop:

	Poor				Excellent
	1	2	3	4	5
Speakers	0	1	14	54	40
Presentations	0	0	17	54	38
Handouts	1	3	40	43	16
Discussion session	1	7	34	39	8

Table 3 - Overall rating of the content and presentation of the workshop:

	1	2	3	4	5	
Poor	0	2	17	64	26	Excellent

Table 4 - Participating in the workshop has been:

Time well spent	75	Moderately useful	33	A waste of time	0
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1.3 The Users Group

The second objective of the project has been met by organizing the seventh INQUEST Workshop in conjunction with TRA – The Transportation Research Arena meeting in Ljubljana on April 25th, 2008.

¹ Travel and subsistence were offered by the host.



The workshop programme was fully performed as follows:

- 08:30 *Registration*
- 09:00 *Introduction*
 Guy Descornet, Belgian Road Research Centre, Brussels
- 09:15 *Point of view of the European Commission*
 Maria-Christina Marolda, Transport Safety Programme Officer, CEC DG RTD
- 09:30 *The need for harmonization*
 Luc Goubert, Belgian Road Research Centre, Brussels
- 10:00 *Presentation of the SILVIA proposal*
 Phil Morgan, Transport Research Laboratory Ltd, United Kingdom
- 10:30 *Break*
- 11:00 *Presentation of the SILENCE proposal*
 Guy Descornet
- 11:30 *Review of current practice and prospects in European countries*
11:30 Mihael Ramsak, ZAG, Slovenia
11:45 Ulf Sandberg, VTI, Sweden
12:00 Jørgen Kragh, DRI, Denmark
12:15 Jürgen Haberl, Heller Ingenieurgesellschaft mbH, Austria
- 12:30 *Lunch*
- 14:00 *Review of current practice and prospects in European countries*
14:00 Wolfram Bartolomaeus, BAST, Germany
14:15 Rob Hofman, RWS, Netherlands
14:30 Phil Morgan, TRL Ltd, United Kingdom
14:45 Philippe Klein, INRETS, France
15:00 Adolfo Guëll, Ministerio de Fomento, Spain
- 15:15 *The need for a User Group*
 Hans Bendtsen, Danish Road Institute, Denmark
- 15:30 *Discussion on whether and how to organize a Users Group*
 Hans Bendtsen, moderator
- 15:55 *Conclusions*
 Hans Bendtsen
- 16:00 *Closure*

Twelve European countries were represented, namely: Austria, Belgium, Denmark, France, Germany, Great-Britain, Netherlands, Norway, Portugal, Slovenia, Spain and Sweden, as well as EC DG RTD and CEN. The list of the 19 participants is given in the **Annex**.

The conclusion was that there is a need to move forward with a view to eventually issuing a European standard on the noise classification procedures of road surface products. The Users Group could possibly make use of the CWA – CEN Working group Agreement procedure to speed up things or just prepare the work with a view to a possible mandate given by the EC to the existing CEN/TC227 on “Road Surface Materials”, which could be taken in charge by CEN/TC227/WG5 “Road Surface Characteristics”.

Detailed proceedings of the workshop were drafted and sent to the participants, which can be considered as the founding document of a group. One obvious way to keep in contact is through



Internet. Therefore, FEHRL has offered to host a specific forum on their web site. The Danish Road Institute will act as first Convener of the Group. They will host the next meeting in Copenhagen on 16/17 September 2008. It has been recognized that more stakeholders should be invited, namely among road authorities.

2. Dissemination and use

The project itself essentially consisted of a wide dissemination of existing knowledge with a view to stimulate the use of it.

Nonetheless, the partners will pursue the dissemination of the knowledge acquired by European as well as national projects on the use of low-noise road surfaces for traffic noise control whenever and wherever opportunities will present themselves in their countries and abroad.

Regarding the use of the knowledge, the group of users is intended to continue the promotion of the use of low-noise surfaces namely by preparing future European standards.

In the meantime, the countries that were involved in the SILVIA project as well as those that hosted the INQUEST Workshops have been made aware of the possibility to use low-noise road surfaces as a cost-effective action as requested by the Environmental Noise Directive.

INQUEST Final Activity Report - ANNEX

**INQUEST – Workshop on classification procedures & systems
25th April 2008, Ljubljana (Slovenia)**

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