D2 Project Deliverable

Dissemination and use plan

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Abstract	Description of the plan of dissemination of the Virtualfires system and identification of potential users.
Keywords	Dissemination, potential users.

Contents

1 Introduction

This report made in the first months of the project collects the ideas that were presented and discussed in the consortium for the dissemination of the VIRTUALFIRES system.

In the first section of the report the end users and the developers introduce their ideas and the different points of view to describe and sell the VIRTUALFIRES system. Three main approaches may be disseminated, that are the idea at the bases of the project, which led to the consortium, the product itself, and the use of the product.

The second section tries to list the potential users that we can find in all the states of the European community.

The third part presents the means of dissemination we shall use.

The conclusion tries to present a strategy that will be mostly adapted to the circumstances that all members of the consortium will meet all along the project.

2 Dissemination of what?

When a common innovative project is built with several actors from different countries, different points of view sustain it. The end users ask for a friendly product with a great number of abilities and the builders want to demonstrate the most innovative part of their environment, that may be algorithm, code or device.

2.1 The basis idea of VF

The accidents that occurred in several European tunnels asked the question of training all people involved in the management, operation and safety of tunnel. With the traffic increase long tunnels are now complex equipments and a good supervision of it needs lot of efforts. In case of incident, the process may be instable and can lead to casualties and injures.

The idea of simulate any incident in a tunnel is worthy of a better training of all people, and informed people can safely manage any incident.

The main dangerous hazard is the fire, and when a fire occurs the first minutes are critical for the fight again the fire. So the need of a simulator able to give an accurate representation of this evolution is obvious. But the representation of flames and smokes remains a challenge and the basis idea of VIRTUALFIRES is to take this challenge.

2.2 The previous product

The product built by the consortium VIRTUALFIRES will be a computer system able to simulate a fire and its evolution in a tunnel. Three stages are scheduled.

1. Classical visualization on PC
2. The use of HMD (Head Mounted Display)
3. The CAVE system for full use of Virtual Reality (VR)

One can find in WP 2.4 project deliverable the details of the capabilities of the system.

2.3 The results of VIRTUALFIRES

The use of the products elaborated by the consortium will give a significant enhancement in the use of VR and simulations for a better safety level in tunnels. It appears that the front-end must be very friendly and that the dissemination must touch all people involved in management of tunnels.

3 The potentials users

Several kinds of users will be interested by one of the three systems provided by the consortium.

3.1 Tunnels designers

The designer of a tunnel needs a computational code for a better definition of all ventilating features used in the tunnel. And these equipments must be integrated as soon as the design phase, because they may have consequences on the civil engineering design.

3.2 Tunnels operators, railways operators and transport companies

The manager of a tunnel wants to control, improve if necessary and manage the ventilation system of his tunnel. Controlling can be made following the feed back of probes when some action is done. Managing is his daily job when the fluctuations of traffic need new set of parameters and when meteorological conditions vary. But the manager of a tunnel needs also tools for training his staff, in usual condition and also in emergency condition.

3.3 Authorities

The authorities want to check if all the safety features lead to a better safety level and they control the use of rules and norms.

3.4 Tunnels users

The tunnel users need training in emergency condition, want to be sure of the visibility of signs and want to be informed of the safety level of the tunnel.

3.5 Fire brigades

The fire-men want to manage the fire fighting system (in collaboration with the tunnel manager) and want also a training simulator for learning young fire-men how to attack a fire.

4 The means of dissemination

4.1 Congresses and conferences

Participation to congresses and conferences is a good mean of dissemination. The oral presentations of papers or during poster session catch the attention of potential users and generally in tunnel conference there is lot of people. Fire aspects do not concern all people but all people are concerned by safety evaluation and knowing the existence of such a tool will lead to test it.

At this time two conferences was chosen for poster presentation, one in Paris about Virtual Reality and one in Toulouse about tunnels. France and Spain organized this last one and Spanish engineers said to CETu that the works done in France about safety, is fully accepted in Spain. That saying means that the diffusion of VIRTUALFIRES is obvious in Spain.

4.2 Revues

Numerous revues about tunnels exist in every country of EC. We are now preparing a paper for TunnelBau (D + A), Galerie (I) and TOS (F).

4.3 Web site

The website (www.virtualfires.com) is used almost for connecting the consortium. In the beginning of 2003 a general presentation of Virtualfires will be set for general purpose.

4.4 Exposition and road show

As a conclusion, the strategy of dissemination

The strategy is very simple. It is the use of all events in the world of tunnels for the opportunity of showing the results of VIRTUALFIRES. The world association of tunnel (AITES/ITA) organizes a world congress every year (Amsterdam in 2003, Singapore in 2004) and Virtualfires will be present. For each country, national associations organize meeting, visits and conferences and it is a good tribune for Virtualfires (Toulouse, mentioned above was this kind of meeting: three days and near 400 people)