### COMMISSION OF THE EUROPEAN COMMUNITIES



Brussels, 04.09.1998 COM(1998) 488 final

Final Report from the Commission to the European Parliament, the Council and the Economic and Social Committee on the EHLASS programme

The purpose of the European Home and Leisure Surveillance System - EHLASS -is to collect data on home and leisure accidents. The number of these accidents exceeds more than 83.000 deaths a year, compared to 45.000 fatal road accidents and 6.000 fatal accidents at the workplace. The types of accidents covered by EHLASS are the most important causes of death for European citizens under 34 years of age. The system is based on data-collection at hospital's emergency units except in three Member States where data are collected by household surveys. The latest decision ended by 31 December 1997. EHLASS is the only general source of information on this kind of accidents.

EHLASS was set up in 1986<sup>1</sup> as a pilot project to collect data in order to identify products causing accidents. The system has been continued through decisions in 1990<sup>2</sup>, 1993<sup>3</sup> and 1994<sup>4</sup>.

The Commission has had an external audit made to provide a background for a more general assessment report on the operation of the system and for proposals for amendments. The executive summary of this report is joined as annex.

On the basis of the external report it is the Commission's general assessment, that the fundamental idea behind the system is correct and that it has been of considerable use for the Member States. However, the use of the data on Community level has not been satisfactory. It is evident that the potential of the system and the Community's financial investment in data collection is by far not sufficiently exploited. One of the main reasons for this has been that the present reporting system where Member States only transmit aggregated data in the form of tables and graphics to the Commission. The Commission does not receive data on the individual accidents, which has the consequence that European or transnational inquiries on specific problems, for example questions on the dangerosity of a certain product, can only be made by asking the Member States for information.

The Commission proposes to solve this problem by easing the access to information by establishing a European Database integrated in the telematic network EUPHIN (European Union Public Health Information Network) which will provide the technological support so that all data would be available to the Commission, the Member States and other interested parties. Work has already been undertaken as regards a data structure and a

Decision Nº 86/138/EEC of 22 April 1986 by the COUNCIL concerning a demonstration project with a view to introducing a Community system of information on accidents involving consumer products, OJ N° L 109/23 of 26 April 1986.

<sup>&</sup>lt;sup>2</sup> Decision N° 90/534/EEC of 22 October 1990 by the COUNCIL amending decision N° 86/138/EEC concerning a demonstration project with a view to introducing a Community system of information on accidents involving consumer products, and fixing the financial allocation for the last two years of its operation, OJ N° L 296/64 of 27 October 1990.

<sup>&</sup>lt;sup>3</sup> Decision N° 93/683/EEC of 29 October 1993 by the COUNCIL introducing a Community system of information on home and leisure accidents, OJ N° L 319/40 of 21 December 1993.

<sup>&</sup>lt;sup>4</sup> Decision N° 3092/94/EC of the PARLIAMENT and the COUNCIL of 7 December 1994 introducing a Community system on home and leisure accidents, OJ N° L 331/1, of 21December 1994. This Decision has been amended by Decision 95/184/EC of the COUNCIL of 22 May 1995, OJ N° L 120/36 of 31 May 1995 in order to include the new Member States.

data dictionary. It is expected that all data on home and leisure accidents from 1986 till 1997 would be fed into a telematic tool before the end of 1998.

The Commission has the following proposals to mend the weaknesses of EHLASS disclosed by the evaluation report:

- Representativity. The Commission proposes to improve representativity by ensuring that Member States choose more representative hospitals in terms of geographical and demographic distribution and of urban and rural areas. First, it is the intention to assure representativity by collecting a set of demographic variables. In a second phase these demographic data would be used to measure the representativity of the participating hospitals to allow a better choice, where needed. Ad-hoc household surveys could be a useful tool to enhance representativity.
- Comparability: Common definitions, classifications and coding rules are a prerequisite for achieving Community-wide comparable data. The work for keeping the existing coding manual from 1986 up to date by adjusting to new developments especially concerning the classification for products and sports must continue. It would be useful to abandon household surveys as the basic data collection in some Member States.
- The data quality is in general good, but could be improved. The external report proposes a method for the measurement for quality, which could be implemented to follow the development of data quality. The Commission intends to develop this measurement of data quality further in co-operation with the Member States. It would be useful to that national EHLASS officials met to co-ordinate a more uniform interpretation of the coding manual.
- The timeliness of Member States to deliver their results has been a problem, as delays at one hospital postpone the national report, which again influences the production of the European summary report foreseen by the EHLASS Decisions. The Commission proposes the abandon of this reporting system and that data in the future should be transmitted directly to the aforementioned database at intervals of three months or shorter or a shorter period according to provisions to be agreed upon with the Member States.
- The European synthesis reports have a volume prohibitive to a distribution in bigger numbers, which was a problem for the accessibility to information. This problem has been solved as the European synthesis of the national EHLASS reports for 1990-95 was published on Internet in May 1997. With the proposed database this kind of reports will be superfluous.
- The coding manual needs amendments, especially for products and new sports.
   Preparatory work has been done, and the Commission proposes that priority be given to finalising and implementing this work.
- Statistical assistance for the data collection and for the evaluation of the EHLASS
  data is also a part of the Statistical Programme 1998-2002. Specific attention will be
  given to assist in adapting the methodology taking into account codes and models
  already existing at Community or international level.

The Commission's subvention to the data collection has been necessary to assure participation from all Member States, as from when the first pilot project was launched in 1986. The experience gained is that Member States benefit from the reduction of accidents and the economic consequences hereof, which should be a sufficient motivation for Member States to carry the economical burden of data collection themselves, whereas it would be natural for the Commission to ensure co-ordination of the action and the maintenance of a European database within the EUPHIN network.

The Commission will take steps to ensure the implementation of the improvements mentioned above towards the future programme. For 1999 and thereafter, the Commission has proposed the integration of the EHLASS system in the Community action Programme on injury prevention in the field of public health (COM (98) 229 final of 15 April 1998). The Commission accepted to this end, 23 of the 28 amendments of the European Parliament in the first reading of its proposal for this programme (COM (97) 178 final).

# Evaluation study of the EHLASS system for the European Commission – Directorate-General XXIV Contract No AO-2600/96/000262

# Summary chapters from the final report of 20 August 1997

DG XXIV commissioned us to carry out a general evaluation study of the EHLASS system. The following pages set out what we regard as the main features of the study. These two chapters are extracts from our draft final report and cover:

- the operational conclusions
- the salient points

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#### THE OPERATIONAL CONCLUSIONS (SYNTHESIS)

#### 1. THE STATISTICS

Our study contains the following conservative estimates for the annual figures relating to home and leisure accidents (HLAs) in the states of the European Union:

- 20 million HLAs resulting in medical care
- 2 million hospital admissions as a result of HLAs
- 83 000 fatalities resulting from HLAs
- 3.9 billion ECU as the minimum cost of hospital admissions resulting from HLAs
- 23 billion ECU as the total cost (direct medical costs and social costs of absence from work).

These figures are to be set against the Commission's annual subsidy of 2.5 million ECU for the operation of EHLASS and an overall total operating cost of 3.2 million ECU in 1995.

#### 2. THE RATIONALE OF THE EHLASS SYSTEM

A specific information system on HLAs is necessary since such accidents represent a major public health problem and involve considerable costs. Moreover, the aim of achieving a high standard of consumer protection is enshrined in the Treaty on European Union. The Commission has also been given the task of promoting public health activities, which encompass accidents and injuries. HLAs are thus a two-fold concern of the Community. In addition, the need to reduce the number of HLAs is clearly stated in objective No 11 of the World Health Organisation for its overall public health strategy up to the year 2000.

Two lines of reasoning have led to the EHLASS system:

- Operational considerations: an upstream data collection system on HLAs is necessary to take stock of the situation, establish priorities, set targets for action and assess how far they are attained.
- Contextual considerations: because of the single market, the free movement of goods, the need to coordinate legislation and prevention policy on consumer safety and public health, Community action on HLAs is necessary in view of the scale and effects of the problem.

This justification for the system's existence does not merely have continuing validity but is indeed strengthened by the convergence of the Commission's very clear aims in the fields of consumer safety (DG XXIV) and of public health in the Community injury prevention programme now in course of preparation (DG V).

#### 3. THE ACHIEVEMENTS OF THE SYSTEM

The main uses of the EHLASS data are to identify risk-related forms of behaviour and population groups (by sex, age, activity, location, etc.) and dangerous products. It is thus possible to select areas for legislative action and to target prevention activities. In many countries, targeted prevention has led to a significant drop in accident rates and severity.

In Denmark, for example, a significant reduction (40%) was achieved in the number of eye injuries resulting from the recreational use of squibs and fireworks. An analysis of the EHLASS data revealed to the authorities that many young boys suffered eye injuries when playing with fireworks. Subsequently, accidents were cut by a targeted safety campaign encouraging the use of protective goggles and manufacturers decided to package safety goggles with fireworks sold to the general public.

This is only one of many examples of national legislative or preventive action. Others are:

- reduction in accidental ingestion of household products by requiring the use of "child-proof" caps and the addition of malodorous ammonia;
- changes in the surfacing of children's play areas to reduce cases of bruising;
- a new standard for folding furniture closure systems, which has cut the number of crushed-finger accidents;
- changes in the closing system for automatic garage doors;
- introduction of new safety standards for pressure cookers;
- adoption of standards for hang-gliding;
- recommendation that safety helmets be worn when mountain biking;
- introduction of warning pictograms for the packaging of high-risk products;
- signing of ski pistes.

Overall, these measures have led to a measurable drop in certain types of accidents. In France, for example, a substantial and steady decline in the number of fatalities has been observed for young persons under the age of 15: 789 deaths from HLAs in 1986, 526 in 1992, i.e. a fall of over 33% in six years (source: INSERM SC8).

In its present form, EHLASS thus functions effectively at the level of detailed accident analysis: identification of high-risk product categories, types of activity and sub-populations. The system cannot yet be used to produce general statistics and health indicators for HLAs.

#### 4. THE MAIN OPERATIONAL SHORTCOMINGS

The system is widely used at national level in many countries, but it is of little direct value to the Commission since the way it operates at present does not allow quick, direct access to information which is sufficiently representative and reliable.

The Commission has direct access only to the standard national annual reports, which give a picture of how the system is working and provide general findings for the various countries but do not yield detailed data for use in specific, short-term projects.

#### 5. THE POTENTIAL OF THE SYSTEM

However, the system has enormous potential:

The information collected in the various countries are already structured in national databases. If this information were pooled in a European base accessible on Internet, the ease and speed of consultation and dissemination of results would be immeasurably increased.

Data quality could be improved by

- combining ongoing data collection within the emergency services with periodic (e.g. five-yearly) EHLASS surveys, which are representative in terms of households, to ensure that the data obtained is more representative;
- instituting the new coding system which has already been devised;
- establishing a standard validation program including consistency checks.

Use of the data could be improved by networking experts to disseminate the new methods of information processing already used in various countries: calculation of a compound severity rating, automated alert system, typology, data mining, etc.

The cost of these measures would be very modest and could be financed by linking the subsidies received by the various states more closely with the work they actually undertake. A slight reduction in the subsidy for simple collection of data would release resources to finance these essential shared tools. These improvements can therefore be made without increasing overall operating costs.

#### 6. OUR CONCLUSION

We firmly recommend supporting the EHLASS system and improving the way it works rather than abandoning it. The foregoing measures alone could enormously increase its usefulness. Given that the estimated average direct cost of an HLA is 368 ECU and the EHLASS operating costs are 2.5 million ECU per year, an annual reduction of 7 000 HLAs over all the countries or 0.03% of the incidence rate for such accidents would mean that the investment was "self-financing" at the macro-economic level in terms of the budgets of the EU Member States.

#### THE SALIENT POINTS (SYNTHESIS)

#### 1. BASIC DATA

Our study contains the following conservative estimates for the annual figures relating to home and leisure accidents (HLAs) in the countries of the European Union:

- 20 million HLAs resulting in medical care
- 2 million hospital admissions as a result of HLAs
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- 23 billion ECU as the total cost (direct medical costs and social costs of absence from work).

These figures are to be set against the Commission's annual subsidy of 2.5 million ECU for the operation of EHLASS and an overall total operating cost of 3.2 million ECU in 1995.

#### 2. WHY IS THE EHLASS SYSTEM NEEDED?

As just explained, a specific information system on HLAs is desirable since such accidents represent a major public health problem and involve considerable costs. Moreover, the aim of achieving a high standard of consumer protection is enshrined in the Maastricht Treaty on European Union. The Commission has also been given the task of promoting public health activities, which encompass accidents and injuries. HLAs are thus a two-fold concern of the Community. In addition, the need to reduce the number of HLAs is clearly stated in objective No 11 of the World Health Organisation for its overall public health strategy up to the year 2000.

Not enough is yet known about HLAs and their importance is underestimated. In many countries, there is insufficient awareness of them as a policy issue. There is thus good reason to promote a European system to remedy this lack of knowledge and the wide discrepancies in the national means available to combat HLAs.

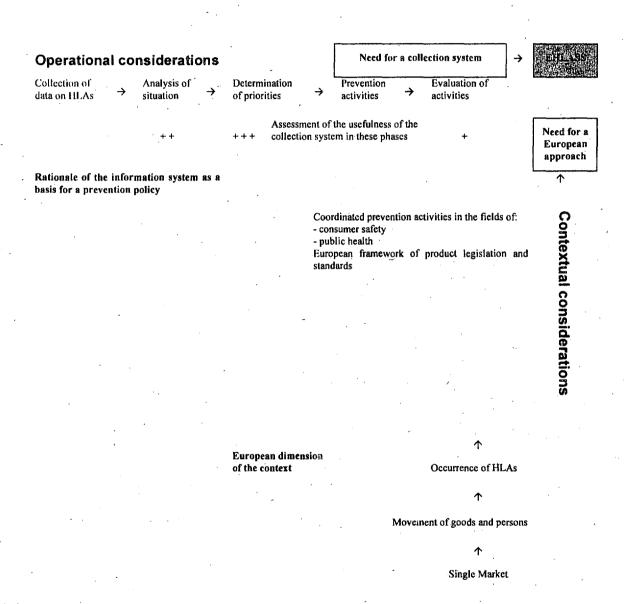
Free movement of goods within the states of the Union leads to heightened problems of consumer safety: any product which is legally manufactured and placed on the market must be allowed access to the markets of all Member States. A major effort of harmonisation and concertation between the Member States has proved necessary to establish Community product safety standards.

The risks associated with HLAs and the products involved in such accidents must therefore be investigated on a European scale a using a standard data collection tool. The EHLASS system has a special relationship with the European standardisation bodies, which consult it regularly. The information obtained through the system is taken into account in the drafting, acceptance and recognition of European standards.

Two lines of reasoning have led to the EHLASS system:

- Operational considerations: a data collection system on HLAs is needed to take stock of the situation, establish priorities and assess the action taken.
- Contextual considerations: because of the single market, the free movement of goods, the need to coordinate legislation and prevention policy on consumer safety and public health, Community action on HLAs is necessary in view of the scale and effects of the problem.

The following schematic is intended to illustrate these two requirements: for a system to collect information on HLAs and for a European approach to accidents. They logically imply the creation and retention of EHLASS as a homogeneous European system for collecting information on HLAs. This justification for the system's existence does not merely remain valid but is indeed strengthened by the convergence of the Commission's aims in the fields of consumer safety and public health.



#### 3. WHAT CAN EHLASS BE USED FOR?

The EHLASS system in its current form should not be expected to provide

- reliable incidence rates and public health indicators for all HLAs in Europe;
- strikingly novel accident analyses at the general level: it is clear that falls will always be the main accident mechanism, that the population groups at greatest risk will for many years to come be children and the elderly, etc.

On the other hand, the pragmatic and operational approach of EHLASS has made a major contribution to specific regulatory or preventive action, such as

- reduction in accidental ingestion of household products by requiring the use of "child-proof" caps and the addition of malodorous ammonia;
- inducing pharmaceutical manufacturers to package medication in multi-blister packs to prevent ingestion of large doses by young children;
- requiring more stable footing and fastenings for ladders;
- changes in the surfacing of children's play areas to reduce cases of bruising;
- making mountain biking safer by recommending that safety helmets be worn;
- introduction of warning pictograms for the packaging of high-risk products;
- recommendation that safety barriers be provided around private swimming pools to reduce the risk of children's drowning;
- signing of ski pistes;
- requirement for adequate safety rails on bunk beds to prevent falls;
- a new standard for folding furniture closure systems, which has cut the number of crushed-finger accidents;
- requirement for instructions for use to be provided on the packaging of toxic gardening products;
- supplementing of the current standard on the safety of playground equipment installed on private premises;
- improvements and compliance requirement for automatic garage door closing systems;
- introduction of new safety standards for pressure cookers;
- encouraging children to wear safety helmets while skiing, to reduce head injuries;
- approach to manufacturers on general use of key-opening cans;
- recommendation to manufacturers that non-heat-conducting materials be used for the external coverings of oven doors;
- adoption of standards for hang-gliding;
- preventing of severe scalding by domestic hot water by lowering the temperature in the distribution system (a measure under consideration in France).

Used retrospectively, EHLASS thus provides answers to precise questions which are already formulated or, used prospectively, provokes questions which lead on to preventive or legislative measures for specific product categories, sub-populations or activities.

In its present form, EHLASS thus functions effectively at the level of detailed accident analysis: identification of high-risk product categories, types of activity and sub-populations. The system cannot yet be used to produce general statistics and health indicators for HLAs.

#### 4. What are the system's strengths?

This system for ongoing collection of data is one of the most important sources of information on HLAs - an area about which not enough is yet known. In 11 out of the 15 countries there are no other collections which are both continuous in time and specific to this topic. The other collections are either of a general nature (e.g. hospital morbidity surveys, death certificates), making it very difficult to determine what relates to HLAs as such, or they are partial sources giving only a very fragmented picture (e.g. poison centres, fire services, burns treatment units, CO poisoning, etc.).

Since there have long been dedicated information systems for road and occupational accidents, it is reasonable for there to be a single source bringing together information on HLAs.

We estimated the lower limit of the range of economic cost of hospital admissions resulting from HLAs at 3.9 billion ECU and the total cost of HLAs (direct medical costs plus social costs arising from absence from work) at 23 billion ECU. Even though they are approximate, these figures clearly show how great these costs are. In European macroeconomic terms, given annual subsidies of 2.6 million ECU for EHLASS, a fall of less than 0.07% in the annual number of hospital admissions in the Member States would be sufficient to offset the Community investment.

The system works satisfactorily at national level in most Member States and has been used to collect pertinent observations for over ten years. In France, for example, over 360 000 observations have been collected and validated, thus forming a database of unmatched size on this topic.

The data and results published are used by many bodies, both public and private, at national level: the ministers responsible for consumer affairs, health, the environment and the media, consumer safety watchdogs, consumers' associations, social services, whether at state, local authority or municipal level, and the health services. Doctors, journalists and students, as well as insurance companies and indeed manufacturers also consult EHLASS. We have established that more than 1 300 requests for information are received by the national co-ordinators annually and that more than 350 specific studies per year are carried out on EHLASS data in Europe.

EHLASS provides replies to a number of questions which no other system can answer thanks to its coding system, which includes over 1 100 product codes: Do skateboards give rise to more accidents than roller skates? How severe are these accidents? What types of injury are sustained? Is there any record of accidents with disposable cigarette lighters? With folding beds? Under what circumstances?...

The system has also made the national authorities more keenly aware of IILAs. Many new projects and new arrangements have been set up or have consolidated their role on the basis of the EHLASS results. A few examples are the establishment of the Commission de la Sécurité des Consommateurs in Belgium, of the Cellule Nationale d'Observation des accidents de la vie courante in France and of a Comité d'accompagnement du système EHLASS in Luxembourg.

A large majority of the teams running the system are competent and enthusiastic about cooperation. They take joint initiatives to launch transnational studies and devise shared tools (e.g. the Stockholm meeting of the representatives of eight countries for the EHLASS conference of 2 and 3 June 1997 on roller-blade accidents).

As we shall see later, there is considerable scope for improving the system. Under-use of the data at transnational level, by the Commission or by consumers themselves, could be addressed by establishing a European EHLASS database accessible via Internet, thus vastly increasing the usefulness of the system at very modest cost.

As yet, the system has not been much used by other Directorates-General. However, the usefulness of the system to DGV in connection with its future "Community action programme on injury prevention in the context of the framework for action in the field of public health" (1999-2003), approved by the Commission on 14 May 1997, and the active support of Eurostat for an overhaul of the system augur very well for the future.

In the course of our interviews, we were often told that "if EHLASS did not exist it would have to be invented". The system is far from perfect but it has the great merit of existing and operating on a routine basis. If EHLASS did not exist, more than two-thirds of the countries (11/15) would have no overall source of information on HLAs.

#### 5. WHAT ARE THE SYSTEM'S WEAKNESSES?

Lack of clarity about the aims: there still seems to be confusion about the very nature of the system ten years after it came into existence. It cannot provide a complete measure of the number and severity of all accidents in daily life, nor can it be regarded as an alert system or a system measuring the consequences of such accidents in terms of public health. The current EHLASS system must be regarded as a databank available to those who want to look more closely into the forms of behaviour, sub-populations or product categories associated with risk. EHLASS must be regarded as a *register* of HLAs.

The coexistence of two approaches – ongoing collection by the emergency services (12 countries) and household surveys (three countries) – reflects the divergent views on the purpose served by the system. The practice followed within each of these approaches is again not entirely uniform.

Representativeness of the data: the arrangements in three countries ensure overall representativeness of the HLA figures obtained by survey while those in another three ensure such representativeness for HLA figures obtained via the emergency services. The other (nine) countries collect non-representative data and seven countries do not ensure exhaustive data collection at all collection sites.

Coding practice: there are differences in the way the product codes are used.

Obsolescence of the coding system, which is more than ten years old: there are no specific codes for sports and the product nomenclature needs to be revised.

Checks: there is a great diversity of logical checks. A standard validation program should be established, including a check on data consistency.

Poor availability of the data in temporal and spatial terms: the annual file often cannot be created until the last hospital has sent its last batch of data. This delays publication of the standard report and availability of the data in the national base. The data from one country are not directly available to the other countries or the Commission and the number of transnational studies is therefore limited. Since there is no accessible European database, none of the players can obtain direct and ready access to all the data collected.

Usefulness of the data: the value of the data to the Commission is slight. The standard national annual reports do not provide detailed information of direct operational value.

Rigidity of the system: the system does not adapt quickly enough to changes in the objectives and requirements or to new information technology as it becomes available (networks and analysis techniques).

Quality of management: there are wide discrepancies between the countries as regards the main aim the system is expected to achieve, the methods used, and the quality and average cost of data collection. The average rating for collection quality is therefore low and there is a wide scatter of operating cost indices. We also feel that at national level fewer resources could be devoted to data collection and more to data analysis and dissemination of results.

Lack of institutional and financial stability: as one assessment report follows the other, the fate of EHLASS has often been under discussion and has depended from year to year on institutional decisions as to whether it would continue to exist. The question asked has often been "Should the system be continued or not?" and this has distracted attention from the other question: "How can the system be improved?".

On various occasions, the possibility that the operating subsidies would be discontinued has led to a loss of impetus in various countries.

The subsidiarity principle: its rigorous application may have undermined the efforts to renew and reform the system at European level, since there was no machinery to provide strong leadership and coordination.

#### 6. WHAT OVERALL ASSESSMENT CAN BE MADE?

The outcome of this review of strengths and weaknesses depends on the point of view of the assessor:

- For the statistician, it is negative: after ten years of existence, the system still does not
  provide sufficiently reliable statistics at European level, although the position in this
  regard is very satisfactory in certain countries.
- For those involved in prevention (consumer safety and public health) or law-making at national level in connection with HLAs, it is generally positive in many countries.
- For those involved in prevention or law-making at European level, it is generally negative, since the European data are not directly available.
- It is very positive if one considers the potential of the system and the scope for future collaboration with Eurostat on methodology, validation and publication of the results and with DG V in connection with the Community injury prevention programme.
   Complementarity of the Community's projects could be enhanced by means of EHLASS.

#### 7. WHAT ARE THE OPTIONS FOR THE SYSTEM'S FUTURE?

There are four options:

- to abandon the EHLASS system;
- to suspend it for one or two years;
- to keep it up in its present form;
- to improve it.

We shall now consider these four options in turn, assessing the system's potential for improvement.

#### 8. SUPPOSE EHLASS WERE ABANDONED?

In some countries, there are sources of information on HLAs other than EHLASS. Abandonment of EHLASS would have little effect on the quality of the information system in this area in the Netherlands or the United Kingdom. In France, regular CNAM and INSEE surveys provide an overall picture of HLAs. In the other countries, abandonment of EHLASS would severely affect the quality of the information system. As we have already stressed, all that would then exist in these countries would be

- general collections (e.g. hospital morbidity surveys, death certificates), making it very difficult to identify figures specific to HLAs;
- partial sources giving a very fragmented picture (e.g. poison centres, fire services, burns treatment units, surveys of CO poisoning, etc.).

The following diagram illustrates the central role of the EHLASS system within the overall arrangements for collecting information on HLAs.

#### Partial sources:

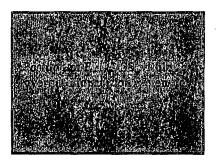
Poison centres, fire services, burn treatment units, surveys of CO poisoning, etc.

#### General sources:

- 'hospital morbidity surveys

death certificates

health surveys



If EHLASS were discontinued, there would thus be a major gap in the information network.

A table in our report shows what general (but not exclusive) HLA information sources other than EHLASS there are in Europe, thus providing an indication of the consequences if EHLASS were to be abandoned. These would be

- very serious in eight countries: Belgium, Ireland, Luxembourg, Austria, Greece, Spain, Portugal and Finland;
- serious in five countries: Denmark, France, Germany, Italy and Sweden;
- minor in two countries: the Netherlands and the United Kingdom.

In the course of our interviews, several national experts spontaneously commented that "if EHLASS did not exist it would have to be invented". In 11 out of the 15 countries, it is the only dedicated national system for collecting data on HLAs.

If EHLASS were not retained as a coordinated system at European level, the general standard of consumer safety would be reduced and essential public health information forfeited. This would

- be inconsistent with the logic underlying the system, which is based on the need for a system of data collection on HLAs and for a European approach to accidents;
- leave 11 countries with no HLA information system at all;
- perpetuate discrepancies in the status of prevention tools and policies in the fields of consumer safety and public health;
- make it impossible to compare the data from the various countries;
- make it impossible to identify rare accidents which may cumulatively acquire significance;

lower the profile of HLAs and reduce the national authorities' awareness of this major problem;

- reduce the scope for targeting prevention policies;
- forfeit a long tradition of cooperation and the experience acquired.

The advantage of this option would be to get rid of a system which is unsatisfactory in statistical terms and of little direct use to the Commission as it works at present. It is true that the present EHLASS system resembles a collection of national systems rather than a unified, truly European system. If it were abandoned, funds could be reallocated.

#### 9. Suppose EHLASS were discontinued for one or two years?

This interim solution would have many disadvantages, viz.

- the work on highlighting the importance of HLAs would lose impetus;
- national and European users would be deprived of a tool essential to the formulation of preventive and legislative policy;
- the arrangements for complementary funding would be disrupted;
- the statistical time series would be broken;
- the existing teams would be disbanded;
- when use of the system was resumed, it would have to be recommissioned, with a consequent loss of time and energy to no real purpose.

The only advantage of this option is that it allows time to plan the introduction of a better system. However, it would be a mistake to think that a new system could restart easily at European level. In addition, the present study and other work have provided the main elements required to design new methods. What is lacking is not ideas and proposals, but decisions and their actual implementation.

#### 10. Suppose EHLASS were retained in its present form?

The present system suffers less from a lack of data (not enough observations) than from the fact that data collection is not always carried out under optimum conditions (exhaustiveness, quality of validation, suitability of coding, speed of availability, etc.). These data are under-used at Community and international level, and at the level of individual users, because it is not possible to consult the whole corpus of European data simply and quickly.

Despite the benefits at national level, the present system does not work well enough. In our view, this means that EHLASS cannot be retained as it stands, especially if one considers the potential of a system adapted to use the most recent technology.

As matters stand, we consider the choice to be made is between abandoning the EHLASS system and improving it.

#### 11. WHAT SCOPE IS THERE FOR IMPROVING THE SYSTEM?

There is considerable potential:

Recent developments in networking, WWW applications and methods of using the data contained in information systems (e.g. data mining) provide a simple solution to most of the shortcomings mentioned. This would not have been the case even two years ago.

Our cost/benefit analysis leads us to suggest that funding for collection as such be reduced in favour of funding for improvement of data quality, data utilisation and the ease and speed of availability to all users.

As an immediate step to reduce collection costs, we propose that

- the level of subsidy be more closely matched to the work carried out;
- if politically feasible, one of the collection sites should be abandoned in countries which have a high ratio of participating hospitals to population;
- that an additional collection site should be included in other countries with a low participating hospitals-to-population ratio.

Overall, this would reduce the proportion of subsidies devoted merely to data collection. We propose that these savings should be reallocated to

- improving data quality by
  - conducting EHLASS surveys, if requested, to improve the representativeness of data in those countries which collect their data on an ongoing basis, so that the advantages of the two methods are combined;
  - recommending and promoting exhaustive collection at the continuous collection sites;
  - introducing the new coding system recently devised;
  - developing and disseminating a standard program for data consistency checking;
  - producing and disseminating recommendations on "good collection practice";
- -- improving data dissemination and use by
  - establishing a European EHLASS database accessible via Internet;
  - feeding this base with input from the collection sites every three months;
  - using E-mail as a general means of communication between the parties involved in the system;
  - developing tools for use of the data (severity rating, automatic alert, typology, etc.)
     related to the national and Community alert systems;
  - promoting cost analysis models;
  - establishing a forum of experts to develop and promote this set of shared tools, which are of value to all the partners.

In the medium term, to reduce the costs of local data collection and depending on the progress of network development, the following would be desirable:

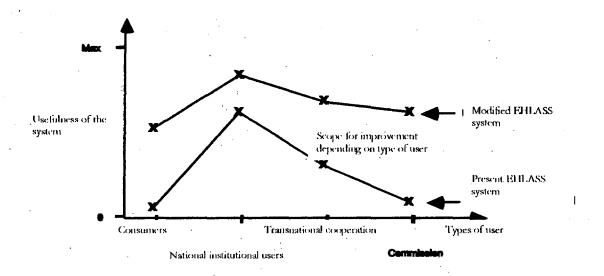
- on-line data collection;
- automatic checks;
- electronic transmission to the central site;
- on-line training in coding;
- on-line standard operation.

We feel that the system's performance and usefulness can be greatly enhanced by these simple steps, without any increase in costs.

To illustrate the scope for improving the EHLASS system, we have produced a diagram plotting its usefulness against the main categories of user.

The degree of usefulness for the various categories is represented by a curve, with a corresponding curve for a future EHLASS system modified as recommended above.

The area between the two curves represents the scope for improvement of the system, depending on the type of user.



To demonstrate the feasibility and usefulness of a base accessible via Internet, we developed a model server accessible at the French site (with a password made available to DG XXIV for tests). This model allows interactive, direct consultation of the EHLASS

France base by formulating a query on an input mask including all the EHLASS variables (a clear text search is also possible). It is possible to consult the records selected, to request standard statistical tables or to download the data.

The EHLASS data from previous years would be taken over into the general European base (base 1) so that all the existing national bases could be used. A reference database (base 2) could also be set up, comprising only data from the hospitals which cover all types of emergency and ensure exhaustive collection of cases. This base would be more representative.

#### 12. OUR CONCLUSION

#### - In view of

- the strengths and weaknesses of the current system as described above,
- the major drawbacks of the options of abandonment, suspension or retention of the current EHLASS system,
- our observations on the scope for improving the system by changes which can be made rapidly, without closing the system down and losing impetus, with technically proven means and at constant cost, achieved by a better allocation of funds,
- the need for information on HLAs in order to pursue consistent and effective consumer safety policies as part of DG XXIV's activities,
- the great value of the system to DGV in the context of its 1999-2003 injury prevention programme and the active support of Eurostat for an improved system,

## we firmly recommend that the improved EHLASS system be introduced as quickly as possible.

#### How can this be done?

- By exploiting the scope for improvement which has been identified by our operational analysis.
- By pursuing vigorously the preparation of the new technical tools mentioned above and firmly coordinating their introduction.
- By placing much greater stress on cooperation with the other Directorates-General, in particular Eurostat, to obtain reliable statistics, and DGV, in connection with the injury prevention programme.
  - By placing the system on a permanent basis. It has been noted that one of the main obstacles to the development of the system has been that its future was not assured. In the past, proposed developments were always frustrated by the fact that a decision was pending on the continued existence of the system. Today, the system has to be given time (four or five years) for far-reaching changes to be made.

#### 13. HOW SHOULD THE FUTURE EHLASS SYSTEM BE USED?

The future EHLASS system is to be seen as a pool of readily accessible data (base 1) for use in detailed accident analysis:

- in an ex-post mode, to answer precise questions which are already formulated (How many accidents occur with supermarket trolleys and are they serious? How many accidents arise from hang-gliding? etc.);
- in an ex-ante mode, to provoke questions by means of simple statistical tools (such as
  a compound severity rating or automated alert system) or by alert procedures carried
  out by the coders at the data collection sites.

With the proposed methodological improvements, and in particular the link between ongoing data collection by the emergency services and EHLASS surveys which are representative at household level, a better sample of hospitals and compliance with the criterion of exhaustive collection at the site, it will also be possible to use the system (base 2) for general accident analysis to provide reliable statistical indicators.

This pool of data obviously must not be a data graveyard (the data are currently underused at European and transnational level and the tools employed are obsolete), it must not be a depository for errors (the quality of the data generated must be improved) and must not be a bottomless pit in financial terms (the race to include more hospitals must stop and subsidies must be reallocated to optimise the cost-benefit ratio).

#### 14. WHY SHOULD THE COMMISSION CONTINUE TO SUPPORT EHLASS?

Because it is important: We have already mentioned the importance of HLAs in terms of consumer safety, public health and economic costs.

Because it is a European responsibility: Free movement of products gives rise to additional risks to consumers. While ready movement of products is desirable, better protection for consumers and compliance with the requirement for products to be safe are also essential. The Commission also has the duty to help ensure a high standard of human health protection by illness and accident prevention activities. EHLASS falls under both of these headings. The very existence of Directorates-General which are concerned with consumer safety (DG XXIV) and protection of human health (DG V) demonstrates the need to coordinate and provide funding for accident prevention activities. It is therefore logical for funding also to be provided upstream for a source of homogeneous information which can guide or inform this policy.

If the European institutions do not finance the project, the countries which are most advanced in the field of prevention will continue their efforts, while the others will cease to do so. This will lead to a wider spread of standards and greater inequality among European citizens with respect to the accidents of everyday life.

Because it is difficult: It has also been mentioned that there is still little awareness of the problem of HLAs, which is underestimated, and that it is difficult to measure the direct impact of prevention policy in this area. It is therefore a subject which is not fully appreciated by national political decision-takers.

Because it would be illogical to stop funding EHLASS: At a time when the achievement of a high standard of consumer protection is enshrined in the Maastricht Treaty and when the Commission (DG V) is instituting the 1999-2003 injury prevention programme, it would be perverse to abandon the only European project which yields the essential information on HLAs.

#### 15. WHY SHOULD THE COMMISSION CONTINUE TO COORDINATE THE SYSTEM?

Because it is logical: Since machinery in one country cannot be expected to coordinate data collection in other countries, it is natural for this to be responsibility of a supranational body, in this case the Commission. Since the Commission already coordinates other information systems in the area (e.g. the rapid information exchange system), it makes sense for it to continue to coordinate EHLASS, even disregarding the system's history (it was established at the Commission's instigation and under its aegis).

Because it is essential: Funding of only part of the system would not be sufficient to maintain the minimum degree of consistency required for a European information system. The content of the information collected in the various countries would quickly diverge. Methods which already differ too widely would lose all comparability. There is a need for a coordinating structure which is sufficiently strong and enjoys credibility and general recognition.

Because of the strategic implications: It is not acceptable for the insurance companies and manufacturers to be the only parties holding information on HLAs. Consumers associations, institutional bodies representing consumer interests, the consumers themselves and those active in the field of public health must also have access to information on such accidents. To ensure this, the system must be coordinated by a body of unquestioned independence: the Commission.

#### 16. How can the most frequent criticisms be met?

"The data are not representative" (problem of representativeness): this question can be addressed by using information from "EHLASS surveys", which are representative at household level, to correct the information derived from the continuous collection system. Exhaustive collection of data at the individual sites and stability of the sample of hospitals must also be encouraged.

"No overall picture of these accidents is provided" (problem of the scope of the enquiry): systematic cross-referencing between the EHLASS surveys and complementary information sources on the one hand and the data collected at the normal sites on the other allows full coverage of the field.

"The data are not comparable between countries" (problem of comparability): this problem can be solved by introducing

- the new collection system harmonising coding philosophy and practice;
- standard software (which could be distributed on Internet) for input, validation and coding assistance;
- regular meetings of co-ordinators to deal with problems of coding consistency;
- arrangements for the data collecting teams to compare notes (by E-mail).

"EHLASS is not a genuine alert system" (problem of the diversity of the system's aims): this is not is main purpose. However, it can make a useful contribution to alert arrangements by the introduction of

- an automated statistical alert tool;
- arrangements for transmission of alert messages between the national EHLASS sites and DG XXIV;
- greater cooperation with other alert systems (rapid information exchange system, safeguard clauses, etc.), allowing interactive consultation of a regularly updated European EHLASS base.

"This system does not identify the products which are really dangerous": this point is linked to the previous one. It is admittedly fairly unusual for products to be the direct cause of HLAs, and the purpose of EHLASS is thus to identify sequences of events, forms of behaviour and sub-populations associated with risks. However, it can also be effective in identifying dangerous products provided that

- the table of product codes is improved;
- the make of product involved is indicated when possible;
- accident victims are contacted for post-hoc studies (accident traceability);
- a compound severity rating for products is used, which has been validated by all concerned and allows historical and geographical comparisons.

"There are not enough variables" or, conversely, "there are too many variables": introduction of the new coding system should deal with this problem by

- the addition of essential variables (coding of sports practised, etc.);
- revision and refinement of the variable nomenclatures (use of logical structures, use of the NOMESCO coding tables);
- better presentation of coding aids.

"The data are under-used": this could be addressed by

- on-line consultation of the European base on the Internet;
- sharing of new tools for data use (typology, data mining, etc.).

"The results are always the same": one of the aims of the EHLASS system is to detect broad trends (general accident analysis). There is certainly little variation in the general findings (high frequency of poisoning in young children, of falls among elderly persons, etc.), but it is important to have a basis of reference which is stable over time in order to

- be in a position to construct behavioural and detailed accident analysis approaches;
- build up a "pool" of data for ex-post and ex-ante studies (a recent example being drowning accidents in swimming pools);
- provide a basis for assessing prevention policies by measuring changes in the frequency (or compound severity rating) of types of accidents associated with products which have given rise to action.

"What will be, will be": this is an expression of cynicism rather than common sense. Section 3 lists many examples of practical measures taken on the basis of the EHLASS data. Only EHLASS can provide answers to many questions such as whether accidents have been reported with a new type of firework, whether a horse-rider's hat affords adequate protection, whether there have been cases of suffocation with a particular type of toy or how many and what types of fractures are caused by snowboard accidents.

"It is not the Commission's job to fund this system": sections 14 and 15 establish that it was appropriate for the Commission to support, fund and coordinate the EHLASS system.

- ⇒ Our recommendation is that three main steps be taken to support and improve the EHLASS system:
  - creation of a European EHLASS database which can be consulted via Internet:
  - introduction of the new coding system;
  - introduction of new data utilisation tools proposed by a joint panel of national experts.

These steps in themselves, without any increase in costs, should give EHLASS its second wind and allow it to take on a new dimension.

- ⇒ The purpose of these changes is
  - to give EHLASS a much more active Community role, especially at the level of the Commission, ensuring greater collaboration with DG XXIV's alert systems, with EUROSTAT and with DG V in connection with the 1999-2003 Community action programme on injury prevention;
  - to have better tools available so that practical steps can be taken to improve consumer safety and the health of European citizens.
- ⇒ The best way of ensuring better data quality in the various countries is very frequent Community use of the data from all countries and the greater ease and sophistication of use that will result from the changes proposed.

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