

## Who perspective on blood safety: The distance learning programme

*Valentina Hafner*

*Blood Transfusion Center of Bucharest, Romania*

"The World Health Organization Blood Safety Unit (WHO/BLS) was established in 1994 to develop strategies for blood safety and promote them on a global, regional and national basis through advocacy and the provision of technical support to WHO member States." Dr. Jean C. Emmanuel, Chief, Blood Safety and Clinical Technology Unit, WHO.

Safe blood is one of the WHO stated priorities, enforced for the year 2000 by the World Health Day theme "Safe Blood starts with me/ Blood saves lives" (developed in conjunct action with the International Federation of Red Cross and Red Crescent Societies).

WHO data base on blood safety contains information from 167 countries. The world distribution of blood donations, blood testing and use has been analyzed for the interval 1997-1999, in relation with the Human Development Index (HDI). The criteria taken into consideration were life expectancy, education and medium income. Results show that more than 75 million blood units are collected annually, while the number of blood donors reported to 1000 inhabitants is 18 times higher in the countries with increased HDI, if compared to low (or medium) HDI countries.

The high cost procedures related to a quality blood transfusion practice and the constant need of national authorities involvement and governmental support, generated important discrepancies, especially in very poor countries, so that, presently 80% of the global population has access granted to only 20% of the safe blood reserve.

World Health Assembly Resolution 28.72/1975 urged member states to establish national blood transfusion services, based on voluntary non-remunerated blood donations. Due to lack of national coordination, only 35% of the 192 member states have now a national blood transfusion policy, a legal frame and a specific structure responsible for the national blood programme. This has been used as a major point for elaborating guidelines, recommendations in order to support and develop a global strategy for a safer blood.

Only a structured and well-organized blood transfusion service can provide the necessary supplies of safe blood. WHO strategy for blood safety considers systematic control of blood donors and blood products as essential, but not enough as a safe blood guarantee. In this respect, 4 key issues are emphasized, covering the blood transfusion chain:

- establishment of a nationally coordinated blood transfusion service, with adapted legal frame;
- blood collection from voluntary non-remunerated blood donors only (low-risk populations) selected by rigorous medical criteria (A system based on voluntary and regular blood donations enables a more efficient use of limited resources, by minimizing the ratio of discarded products.);
- screening all donated blood for transfusion transmissible infections and immunohematology using the most appropriate tests available, good laboratory practice in all aspects of blood processing;
- reduction of unnecessary transfusions and increasing transfusion therapy efficacy (adequate clinical use of blood).

Quality, the 5<sup>th</sup> main target should be present at every level, including the aspects of global management and policy.

As a pertinent tool for local training, up-dating and use of international recommendations on blood safety, WHO initiated the distance learning materials, specially designed and supplied directly to individual learners. This type of educational programme is part of WHO strategy to support national training initiatives on blood safety. It provides ongoing tutorial, guidance and supervised practical training. It can also be adapted to fit professional commitments and individual learning requirements, considering the variation of training needs of staff working at different levels of the BTS.

The BTS distance learning materials: "Safe blood and blood products", have been translated by now in Russian, Arabic, Spanish, Portuguese, Romanian, Chinese and Farsi.

The modules cover the following subjects:

- Introductory module: Guidelines and principles for safe transfusion practice;
- Module 1: Safe blood donation;
- Module 2: Screening for HIV and other infectious agents;
- Module 3: Blood group serology;
- Trainer's guide;
- Establishing a distance learning programme in blood safety: a guide for programme coordinators.

In 1999, the "Costing of Blood Transfusion Services" (financial management of the BTS) has been released, while the "Clinical use of Blood" (module + pocket handbook) and "The Blood Cold Chain" (guide for managers and users) are under preparation.

The aims of the whole distance learning project are to:

- update knowledge;
- improve technical skills and performance;
- strengthen understanding and abilities;
- encourage evaluation of personal and general practice;
- identify errors and ways of correction and improvement.

The target audience is represented by all actors involved in transfusion medicine:

- propaganda officers: in charge with pro-donation education, donor recruitment, motivation and retention;
- laboratory technical staff: in blood transfusion centers, hospitals, public health laboratories;
- teaching staff: senior professionals involved in training programmes, in blood transfusion services, universities, other training institutions;
- medical/ paramedical staff: wishing to know more.

The learner support system involves trainers, responsible for facilitating and training, and supporters: responsible for providing individual guidance, feedback and support at local level. A national coordinator is necessary for programme management.

In practical terms, an increased number of staff can have access to training. The modular structure of the materials accommodates to various degrees of knowledge, becoming a "build on" process of learner's individual experience.

The whole learning process is more cost-effective (fewer trainers, reduced staff absence, in service training) compared to other educational programmes. In the same time, the constant use of training materials written by international experts, with reference to generally accepted recommendations, promotes uniformity in approach and standardization of procedures.

Supported by health authorities and carefully planned, a distance learning programme can become an important tool in increasing awareness, developing and strengthening staff abilities for a safer transfusion practice.

The WHO initiative – creating specific distance learning materials, offers a flexible and cost effective issue for extensive training and improved quality approach in transfusion medicine.

*Acknowledgments: Special thanks to Dr. Luc NOEL, Coordinator, Blood safety and Clinical Technology Unit, WHO Headquarters, which provided the information used*