

THE RED CROSS CHERNOBYL HUMANITARIAN  
ASSISTANCE AND REHABILITATION  
PROGRAMME

# EVALUATION

## REPORT

OCTOBER 1993

EVALUATION REPORT  
ON  
CHERNOBYL HUMANITARIAN ASSISTANCE AND REHABILITATION  
PROGRAM

The International Federation of Red Cross and Red Crescent Societies ( IFRC ) and the Ukrainian Red Cross Society (URCS) plan to organise an international workshop on the Red Cross Chernobyl Humanitarian Assistance and Rehabilitation Program end of November, 1993. The aim is to discuss its achievements, potentials and possible future implementation. In preparation to this conference, IFRC has assigned an independent group of experts to analyse the present status, evaluate the results and form relevant recommendations with regard to further development of the program. For composition of the team, see Annex 1.

## BACKGROUND

### GENERAL

26 April 1986, the Chernobyl Nuclear Power Plant Disaster ( CNPP -Disaster ) occurred, contaminated large areas of Belarus, Russia and Ukraine, affecting about 10 million people including some 780 000 children. Based on an IFRC survey made by international experts January 1990, it was recommended that IFRC and the Russian Alliance of Red Cross and Red Crescent Societies should assist-In the Appeal no 18/90 dated June 25th 1990, these recommendations were adopted and the major objectives presented were as follows:

- the provision of accurate information to the people directly affected by the accident
- counselling to help alleviate psychological problems that are apparent in much of the population living in the affected areas
- provision to Red Cross workers of the equipment required to ensure daily control of contamination levels in the affected areas
- supply of medical equipment, should sufficient support be forthcoming from participating National Societies

To initiate and implement this program, IFRC established a Delegation in Ukraine ( Kiev ) assisting the Special Co-ordination Board under the chairmanship of Dr I. Usichenko, Chairman of URCS. Considering the highly specialised program that was proposed, a review of the technical, scientific, medical and organisational issues were made by Dr H. Dige-Petersen, Danish Red Cross and Mr P Howard, IFRC Representative, Kiev. Based on their recommendations (November 1990), a precise implementation plan could be outlined.

The original Plan of Action and its up dated versions March 1991 and October 1992 has resulted in the creation of six mobile teams that provide general health examinations, laboratory services, radiological-monitoring and individual as well as general health advise related to findings, particularly focused on contamination problems.

This program has been affected by external factors that have forced dramatic changes of operational and administrative methods. The disintegration of the Soviet Union into 15 Newly Independent States, resulted in the situation that the Project became operative in three different countries and by three National Societies. The subsequent inflation and its effects have

created socio-economic misery for most people, adding further psychological stress to those already affected by the CNPP disaster, the target group of the project.

#### THE PRESENT SITUATION

Although hampered by considerable problems during the initial implementation phase, the project successfully operates in Belarus, Russia and Ukraine. Many organisations are monitoring radiological and medical parameters for pure scientific ideals and purposes. The Red Cross project is unique, since it is the only project regularly reaching peripheral villages and focus on alleviation of stress caused by fear from diseases and their relation to irradiation and contamination.

So far, more than 200 000 people have benefited from the program and 61 000 have been examined by the Red Cross Mobile Teams. All the teams are not fully operational, but the management and administrative capacity have increased significantly during the last six months. The integration and input from the three operational National Societies, varies considerably. The total IFRC input amounts to CHF 6,9 million and under the present circumstances, the budget will cover continued operations for another six months.

#### STATUS REPORT

##### EVALUATION OF PROGRAM ACTIVITIES

The late start of the program and problems with implementation have been enhanced by the fact that the Chernobyl Co-ordination Committee was not formed until lately. Since April 1993, three meetings have been held and together with greatly improved Federation administration and management capacity, the prospects for a better co-ordination and problem solving is evident.

The three National Societies suffer badly from financial constraints and they have not been in a position to fulfil their commitments outlined in the formal Agreement with the Federation. This affects basic things like staff support etc, which still mainly has to be carried by the Federation.

However, the prospects of acquiring necessary support from the National Societies varies considerably. Belarus has taken active steps towards financial participation, but Russia and Ukraine have not yet found the means to do so.

There are serious shortcomings concerning maintenance of vehicles, equipment as well as deliveries of basic material needed for the program. Locally, most repairs and purchases can not be done and therefore, the Delegation is dependent on such services abroad. A complicated financial support situation delays decision making and money-transactions beyond acceptable levels.

To a great extent, information about maintenance and other problems faced in the field are not coming through and there is no organised reporting or feedback system.

Not all dosimeters have been used and in fact nearly 50 % of them are out of order. Vital parts of a whole body monitor has been stolen as well as a food monitor.

The whole body monitors and the food monitors are widely used.

Concerning the food monitors, there is a technical problem due to the  $^{40}\text{K}$  to be solved when lowering the accepted level for radioactive contamination. This may be solved with the states individually.

The already selected 23 laboratory parameters have been proven relevant, but the chemical analyser (protein, creatinine etc.) is not regularly used. The mobile laboratory is using micro blood sampling technique, sufficient for the purpose. Further specialised blood sampling ( e.g.  $\text{T}_3$  -  $\text{T}_4$ ) is not carried out despite sufficient equipment is available.

The pressure from other organisations and hospitals for including additional tests and equipment can not be accepted, when available facilities are not fully utilised. Additional tests must be performed at stationary laboratories. Those laboratories often suffer from lack of reagents etc. something the Red Cross should address.

Lack of quite basic management principles, hampered the initial implementation. This has now been attended to and the introduction of a Mobile Team Co-ordinator have stabilised the work in the field considerably.

#### NEEDS ASSESSMENT

The overall impression is that the community suffers from a sort of radio phobia, where the widespread anxiety would better be described as an effect of socio economic and psychological stress rather than fear for irradiation. It is of course a combination of these factors and the effects can not be separated from each other.

In this perspective, the principles of Red Cross project of rapid examinations and quick provision of results makes a lot of sense.

#### THE RED CROSS PROJECT ACTIVITIES CORRELATED TO OTHER PROGRAMS

The Red Cross program was one of the first international rehabilitation programs to be implemented in the three countries. Since then, a big number of organisations have started up radiological and health monitoring, but for mainly scientific reasons.

The Red Cross program is unique in many respects. In contrast to other organisations and programs, it provides:

- badly needed services in rural areas
- certain support to local, peripheral health authorities
- health examination and laboratory services not only focused on possible radiological effects, but takes into consideration the accumulated stress added by the dramatically changed socio-economic situation, its effects on diet, health and welfare.
- direct information and advise to the individual
- practical advise on how to avoid exposure and how to decontaminate foods
- when indicated referral of a patient for treatment.
- all collected data is used by the governments and local health authorities to provide better health care services
- promotion for co-ordination and collaboration between Red Cross, the governments and other organisations

It conforms with laid down policies and recommendations made by the three governments and the specific Ministry of Chernobyl. It is enjoying a very high credibility from the governments.

Representatives from all three governments and their competent authorities, have expressed their satisfaction with the program, its goals, strategies and effects. It fills a well defined gap in the health care services that the health authorities don't have the financial capacity to address and the high workload at peripheral health care level. They have all expressed a wish for a future intensified program even more focused on direct services and information to the rural population in the most affected areas.

The experiences gained from the Red Cross Chernobyl program has already been utilised. In June 1993, one of the Mobile Teams was invited by the Russian Red Cross and the Russian Health Authorities to carry out a radiological and health screening in Cheliabinsk. The detailed results are presented separately.

It is envisaged that the future program in each of the three countries may differ in their approach to reach already set general goals. Also, the mode of operation may vary locally. To clarify roles and responsibilities, establishment of agreements between each team and the relevant operative partner is recommended.

For the time being, several teams are not under direct control of the Red Cross. It is absolutely crucial, that they all are identified as Red Cross Teams and that all staff undergoes dissemination training.

The co-ordination between various organisations the Red Cross and the governments needs improvement. There is a tendency that data, experiences and operational aims and objectives are not shared in a way that promotes effective use of the total input. WHO has initiated this process, which should be supported by the Red Cross. Local regular meetings could solve a number of these constraints.

Based on the experiences made so far, design and implementation of an additional health education component is imperative. In the relevant departments of the Health Ministries, attempts to print health education material is hampered by financial constraints. UNESCO Ukraine office, the Red Cross and the governments may find possible means for co-operation in this field. The initial Red Cross Plan of Action included provision o-f printing facilities and this should be reviewed with high priority.

#### CAPACITY OF RED CROSS STAFF TO MEET NEEDS OF TARGETED POPULATION

Considerable attention has been paid to staff training and preparations before the implementation phase of the program. Due to some financial support problems, the turn over of field staff has been high, putting extra stress and need for continued education as well as regular introduction training. Financial counter measures have been taken and situation has stabilised, but review of regular in-service training needs are required to further increase the operative capacity.

Psychological stress caused by the CNPP disaster and its possible long-term effect, was expected to cause big numbers of psycho somatic disorders. The impact of the deteriorated socio economic situation for most people has enhanced this problem tremendously. It is not possible to tell what affects people most and since the food intake has become upset, people have become more susceptible to diseases as well. To understand all implications of these

phenomenon and to provide health education that really matters, needs quite intensive and further training of staff. Psychological training and support may be provided by planned UNESCO programs.

It has been discussed whether the Mobile Teams should all have specialists like paediatrician, endocrinologist, therapist and stomatologist/dentist. The medical examination must be a screening process. Most additional examination and laboratory facilities required by such specialists, can not be provided by the mobile units. The specialists, if available at the visited clinic, should be utilised. Otherwise, patients should be referred back to specialists at the bigger hospitals.

Children ultrasound screening has been introduced by some of the Mobile Teams. Effective use of such a device, requires years of training. The positive effect of offering this service is that it attracts a lot more people to the clinic. The problem is that there for a number of false positive findings that may scare people. Still it must be considered as an asset, since real cases will be found and indeed increasing that possibility by attracting a lot of people coming for examinations.

Introduction of T<sub>3</sub> - T<sub>4</sub> hormone tests at the Mobile Clinics may prove itself not possible. Instead, preparations for sample taking and cooling can be made and provision for analysis to be performed at the connected clinical laboratory.

Laboratories supporting the Mobile Teams, should be provided with reagents and in selected cases, laboratories at the clinics where the Mobile Team may operate.

The Mobile Teams refer patients to various hospitals, clinics and put extra burden on felter clinics post operatively/post treatment. Very basic support of syringes, bandages, some medicines, etc should be provided to those institutions affected most by the Red Cross activities.

However improved over the last period, it is stressed that regular feed back of correct data is of utmost importance and to secure this, further training of staff is needed.

The practical implementation in the field is monitored by a program manager, who knows the program to perfection. Since he is alone in this position and increased workload is envisaged, an assistant position must be introduced.

Few staff members are familiar with the Red Cross principles and do not have knowledge about the Movement.

## **CONCLUSIONS AND RECOMMENDATIONS**

Although, the Red Cross Chernobyl Humanitarian Assistance and Rehabilitation Program was upset by a number of unforeseen and unpredictable events during the initial implementation phase, the program has picked up considerably and now serves a big number of beneficiaries that would not have had access to health care.

Most objectives and parts of the Plan of Action have been implemented .

It is, however, our firm impression that the effort to keep it a unity will exceed the efforts of the delegation in the near future, mainly due to the political and economic situation. We therefore recommend to hand over the facilities, donations, and obligations to the operating National Societies after a further operational period of two years.

The need of humanitarian assistance will persist, but to decreasing degree it will be justified - or mainly justified- by the Chernobyl disaster.

## RECOMMENDATIONS

### 1. Objectives and Strategies.

The main objectives and strategies previously outlined and now under implementation, must remain.

### 2. Organisation and Management.

Due to the situation described, we suggest that the program responsibilities should be gradually handed over to the operational National Societies during a period of two years. The Kiev based Federation Delegation should serve as a co-ordination office for another two years. It is imperative that an expatriate Program Co-ordinator is to assist the three National Societies and the Chernobyl Co-ordination Committee in the implementation of the program and the gradual take over of responsibilities. Good Public Health Care knowledge is required as well as excellent organisational capacity. Recognition and upgrading of the status of the Federation Delegation, Kiev is required in all three countries. This will greatly facilitate co-ordination and operations between the three countries. To effectively regulate terms and conditions of co-operation between the Mobile Teams and their hospital/clinics, formal Agreements need to be established, outlining use of vehicles, staff and their salaries, equipment, medical material and re agents. It is imperative that they are operated under the umbrella of the Red Cross. The mobile Team Co-ordinator function is vital and should be supported by an assistant. Monitoring of activities and results should be the responsibility of the Mobile Team Co-ordinator. The function of the Inter-Republican Chernobyl Committee needs strengthening and further assistance in its task to organise and co-ordinate the activities and the gradual take over during the next two years.

### 3. Information Policy.

Written health education information should be produced as previously recommended. One central printing facility is needed.

### 4. Mobile Teams.

Permanent activation of all teams is needed to ensure optimal functions and allocation to most needy areas. Repair, maintenance and equipment of vehicles and equipment is crucial, due to envisaged budget constraints during 1994. Supply of mineralised vitamins - a constant and extended supplies recommended. A limited supply of medicines, bandages etc. for hospital and post-hospital care for highly selected groups.

### 5. Supply for-Stationary Laboratories.

A limited supply of selected reagent for laboratories of dispensaries, where mobile teams are based.

### 6. Teaching and Training

These activities should be continued and intensified. Information about Red Cross movement and principles needs to be emphasised.

**LIST**  
**of the expert group of the IPRC**  
**on the evaluation of the International Chernobyl**  
**Programme of Humanitarian Assistance and Rehabilitation**

1. Herrlet Dige-Petersen, M.D., D.M.Sc., Department of Clinical Physiology and Nuclear Medicine, Glustrup Hospital  
Copenhagen, Denmark (Head of the group)
2. Hokhan Sandbladh, Medical Delegate, the IPRC Moscow Delegation
3. Professor, DMS Evgenia G. Matvienko, Head of Radioisotopic Diagnostic Department of the Institute Obninsk city, Russia
4. Professor, Valeriy A. Rzhetsky, Chief Doctor of the Specialised Dispensary of Radiative Medicine



Belarus

5. DBS Ivan P. Los', Head of Radiological Laboratory of the Department of Dosimetry and Radiative Hygiene of the Ukrainian Scientific Research Centre of Radiative Medicine, member of National Committee on Radiological Protection  
Kiev, Ukraine

#### **LIST OF REFERENCES**

1. Report on Assessment Mission to the Areas Affected by the Chernobyl Disaster, U.S.S.R., February, 1990
1. Appeal of the Ukrainian SSR Council of Ministers to the Governments, the Public of Foreign Countries, International Organisations, April 12, 1990
1. Appeal No 18/90, Chernobyl (USSR)-Humanitarian Assistance and Rehabilitation Programme. June 25, 1990

1. Chernobyl (USSR) Humanitarian Assistance and Rehabilitation Programme, Situation Report No. 1, September 1990
1. Terms of Reference for Dr. Harriet Dige-Petersen, assigned to review the medical aspects of the Chernobyl Assistance Programme, October 1990
1. Review of Chernobyl Humanitarian Assistance Programme by Harriet Dige-Petersen, Patrick Howard, November 1990
1. Final Mission Report, December 1990
1. Operational Report of Mr. Michael Behr, League Representative in Kiev, 5 March 1991
1. Appeal Update, 12 March 1991
1. Agreement between the Alliance of Red Cross Societies of the USSR and the League of Red Cross on Co-operation in Chernobyl Humanitarian Assistance and Rehabilitation Programme, 26 April 1991
1. Report on Planning Mission from 14-21 April in the USSR Humanitarian Assistance and Rehabilitation Programme, 1991
1. Final Report of Mr. Michael Behr and copy of the Report of Mr. B. Dietrich on his Technical Planning Mission in the USSR, 1 May 1991
1. Situation Report No. 01/91, September 1991
1. Situation Report No. 01/92, April 24 1992
1. Agreement Between the Red Cross Society of Belarus, the Red Cross Society of Russia, the Red Cross Society of Ukraine and the IFRC on co-operation in Chernobyl Humanitarian Assistance and Rehabilitation Programme, 19 May 1992
1. Appeal No. 50/92, 13 October, 1992
1. Situation Report No. 1/93, May 21, 1993
1. International Workshop on the Red Cross Programme aimed at the Alleviation of the Consequences of the Chernobyl Nuclear Power Plant Disaster, 22-25 November, 1993

**Itinerary of Visit of Expert Group**  
(18. - 23. October 1993)

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|-----------------|---|
| Monday, 18.10.  | Briefing at IFRC office.<br>Discussions and conclusions about reached and failed goals, actual problems and future aspects. |
| Tuesday, 19.10. | Visit of Sasakawa Diagnostic Centre in Kiev which is based at the   |

Regional Hospital No. 2 (Getting acquainted with Sasakawa Thyroid Project).

Visit of Special Children Dispensary in Kiev. Discussions with Mrs. Nadyezhda N. Gudzh (Chief physician) -and staff of physicians about actual problems on state of health in the affected areas.

Reception by Mrs. Nasdyeshda S. Lapko, Vice-Chairwomen of Ukrainian Red Cross Society.

Wednesday, 20.10.

Travel to Gomel.

Visit of Special Dispensary for Radiation Medicine. Discussions with Mr. Victor. E. Derjitsky (Chief physician of dispensary) and Mrs. Natalya A. Mazuryenok (Representative of Gomel Red Cross Region Committee) about work of Red Cross Mobile Diagnostic Laboratory.

Thursday, 21.10.

Travel to Dobrush.

Visit of Gomel Mobile Diagnostic Team in "Field".

Travel to Kiev.

Friday, 22.10.

Visit of Ukrainian Ministry of Health.

Discussions with Mrs. Olga A. Bobileva on Chernobyl Programme related questions.

Saturday, 23.10.

Begin of summarising and report.

Visit of UNESCO office in Kiev. Meeting with Mrs. Lyubov Hokic, UNESCO representative Discussions on psychological aspects of Chernobyl.

Proceeding on summarising and report.