ENVIRONMENTAL AND SOCIAL SYSTEMS ASSESSMENT for

*Program-for-Results: Improving Quality and Efficiency of Health Services in Croatia*

**DRAFT**

**January 18, 2014**

**Table of contents**

[Executive Summary 7](#_Toc377842414)

[1 Description of the Program with an identification of its environmental and social aspects and potential impacts 11](#_Toc377842415)

[1.1 Program’s objectives, scope and activities 11](#_Toc377842416)

[1.2 Key participating agencies 14](#_Toc377842417)

[1.2.1 The lead partner and main coordinator of the Program implementation: Ministry of Health (MoH) 14](#_Toc377842418)

[1.2.2 Other key stakeholders 15](#_Toc377842419)

[1.2.2.1 Ministry of Finance 15](#_Toc377842420)

[1.2.2.2 Croatian Health Insurance Fund (CHIF) 15](#_Toc377842421)

[1.2.2.3 Agency for Quality and Accreditation in Health Care and Social Welfare 15](#_Toc377842422)

[1.2.2.4 The Croatian National Institute of Public Health (CNIPH) and county institutes 15](#_Toc377842423)

[1.2.2.5 Counties and the city of Zagreb 15](#_Toc377842424)

[1.2.2.6 Professional chambers 16](#_Toc377842425)

[1.2.2.7 Alliance of Patients' Organizations /KUZ- Koalicija udruga u zdravstvu/ 16](#_Toc377842426)

[1.2.2.8 Ministry of Social Policy and Youth (MSPY) 16](#_Toc377842427)

[1.2.2.9 Ministry of Labor and Pension System (MLPS) 16](#_Toc377842428)

[1.2.2.10 Trade unions (for Health Care Workers) 16](#_Toc377842429)

[1.3 Program’s potential social and environmental impacts 16](#_Toc377842430)

[1.3.1 ENVIRONMENTAL SCREENING 16](#_Toc377842431)

[1.3.1.1 Environment related aspects of the Croatian HealthCare system 17](#_Toc377842432)

[1.3.1.2 Screening impacts of foreseen Program’s activities 18](#_Toc377842433)

[1.3.1.3 Screening environment related aspect of the Croatian HealthCare system for potential issues that merit inclusion on the list of priority problems addresses by the Program 21](#_Toc377842434)

[1.3.2 SOCIAL IMPACTS SCREENING 27](#_Toc377842435)

[1.4 Brief consideration of the borrower’s more recent experience relevant for the Program 29](#_Toc377842436)

[1.4.1 Recent relevant experience related to the Environmental aspects of the Program 29](#_Toc377842437)

[1.4.2 Recent relevant experience related to the Social aspects of the Program. 30](#_Toc377842438)

[2 Description of Applicable Management Systems 32](#_Toc377842439)

[2.1 Relevant Environmental Management Systems 32](#_Toc377842440)

[2.1.1 Management systems relevant for the Program’s potential impacts 32](#_Toc377842441)

[2.1.1.1 Construction works 32](#_Toc377842442)

[2.1.1.2 Systematic management, monitoring and accreditation of the quality (including environmental performance) within the HealthCare sector 32](#_Toc377842443)

[2.1.2 Management systems relevant for other identified HealthCare sector environmental priorities 33](#_Toc377842444)

[2.1.2.1 Medical waste management 33](#_Toc377842445)

[2.1.2.2 Radiological safety within the medical facilities and radioactive waste 33](#_Toc377842446)

[2.1.2.3 Hospital infections 34](#_Toc377842447)

[2.1.2.4 Occupational safety within the hospitals 34](#_Toc377842448)

[2.1.2.5 Energy efficiency in HealthCare sector 35](#_Toc377842449)

[2.1.2.6 The areas under the jurisdiction of the Sanitary inspection, including: chemicals and biocides safety, environmental noise protection and protection from nonionizing radiation 35](#_Toc377842450)

[2.1.2.7 Environmental Health & EH Laboratory Services 37](#_Toc377842451)

[2.2 Relevant Social Management Systems 37](#_Toc377842452)

[2.2.1 Task force in charge of the reforms 37](#_Toc377842453)

[2.2.2 Current practices, legal and institutional framework securing equity in access to HealthCare services 38](#_Toc377842454)

[2.2.3 Current practices, legal and institutional framework securing social accountability of the Croatian HealthCare service 39](#_Toc377842455)

[2.2.3.1 Participatory Approach Applied 39](#_Toc377842456)

[2.2.3.2 Patients’ Associations and Patients’ Rights 39](#_Toc377842457)

[2.2.3.3 Capacity Building 40](#_Toc377842458)

[2.2.3.4 Grievance Mechanism 40](#_Toc377842459)

[2.2.4 Current practices, legal and institutional framework securing employees’ rights within the Croatian HealthCare service 41](#_Toc377842460)

[3 Program Capacity and Performance Assessment 42](#_Toc377842461)

[3.1 Environmental management system assessment 42](#_Toc377842462)

[3.1.1 Assessment of the management systems relevant for the Program’s potential environmental impacts 42](#_Toc377842463)

[3.1.1.1 Construction works 42](#_Toc377842464)

[3.1.1.2 Systematic management, monitoring and accreditation of the quality (including environmental performance) within the HealthCare sector 42](#_Toc377842465)

[3.1.2 Management systems relevant for other identified HealthCare sector environmental priorities 43](#_Toc377842466)

[3.1.2.1 Medical waste management 43](#_Toc377842467)

[3.1.2.2 Radiological safety within the medical facilities and radioactive waste 43](#_Toc377842468)

[3.1.2.3 Hospital infections 44](#_Toc377842469)

[3.1.2.4 Occupational safety within the hospitals 44](#_Toc377842470)

[3.1.2.5 Energy efficiency in HealthCare sector 45](#_Toc377842471)

[3.1.2.6 The areas under the jurisdiction of the Sanitary inspection, including: chemicals and biocides safety, environmental noise protection and protection from nonionizing radiation 45](#_Toc377842472)

[3.1.2.7 Environmental Health & EH Laboratory Services 47](#_Toc377842473)

[3.2 Social management system assessment 47](#_Toc377842474)

[3.2.1 Capacity of the task force in charge of the reforms 47](#_Toc377842475)

[3.2.2 Current challenges in securing equity in access to HealthCare services 48](#_Toc377842476)

[3.2.3 Assessment of the current practices in securing social accountability of the Croatian HealthCare service 48](#_Toc377842477)

[4 Suggested areas of improvement and inputs to the Program Action Plan 50](#_Toc377842478)

[4.1 Environmental aspects related suggestions for improvement 50](#_Toc377842479)

[4.1.1 Measures important for avoiding potential negative environment related impacts and maximizing potential environment-related benefits of the currently proposed Program 50](#_Toc377842480)

[4.1.1.1 Technical assistance to Agency for Quality and Accreditation in Health Care and Social Welfare in foreseen implementation of hospitals’ accreditation (in line with the accreditation scheme that includes environment-related accreditation standards) 51](#_Toc377842481)

[4.1.2 Measures which proactively address environment-related priorities and opportunities within the HealthCare sector, which are not addressed by currently proposed Program 51](#_Toc377842482)

[4.1.2.1 Measures recommended for inclusion in the Program 51](#_Toc377842483)

[4.1.2.1.1 Technical assistance to Croatian State Office for Radiation and Nuclear Safety in Preparation and implementation of projects improving radiological safety within the medical facilities 51](#_Toc377842484)

[4.1.2.1.2 Technical assistance to the Agency for Quality and Accreditation in Health Care and Social Welfare in establishment of fully operational monitoring of the hospitals’ compliance with adopted mandatory quality standards which includes also cover issues of hospital infections and occupational health within the medical facilities 52](#_Toc377842485)

[4.1.2.1.3 TA to the MoH in its role of coordinator and facilitator of preparation and implementation of EE projects in the HealthCare sector 52](#_Toc377842486)

[4.1.2.2 Measures recommended for inclusion in the next upgrade of the NHCS and forthcoming programs supporting its’ implementation 53](#_Toc377842487)

[4.1.2.2.1 Establishment of the comprehensive permanent program dealing with the continuous active greening of the Croatian HealthCare sector 54](#_Toc377842488)

[4.1.2.2.2 Securing sufficient capacity of the Sanitary inspection by reassignment of some staff currently employed in Health ecology service of Public Health Institutes 54](#_Toc377842489)

[4.1.2.2.3 Upgrading of the Health Ecology Services from current status of the provider of EH laboratory services to the main implementer and coordinator of wider set of standard EH tasks and projects 54](#_Toc377842490)

[4.2 Social aspects related suggestions for improvement 55](#_Toc377842491)

[4.2.1 Recommendations for improvements of the system’s change / reforms management capacities 55](#_Toc377842492)

[4.2.2 Recommendations for improvements of equity in access to HealthCare services 55](#_Toc377842493)

[5 Annexes 56](#_Toc377842494)

[5.1 Matrix summarizing the proposed corrective actions / mitigation measures, including corresponding indicators of completion 56](#_Toc377842495)

[5.2 Description of implemented public consultation plan / minutes of public consultations / summary of feedback received during the consultation process 56](#_Toc377842496)

[5.2.1 Initial meetings with representatives of the key stakeholders 56](#_Toc377842497)

[5.2.1.1 Consultations related to environmental issues 56](#_Toc377842498)

[5.2.1.2 Consultations related to social issues 60](#_Toc377842499)

[5.2.2 Presentation and discussion of the Final draft ESSA report at the WS with invited representatives of all the key stakeholders and other interested public 60](#_Toc377842500)

[5.3 A brief assessment of Integrity issues related to the Program 60](#_Toc377842501)

[5.3.1 Transparency, integrity and accountability in selection of the Program’s activities 60](#_Toc377842502)

[5.3.2 Systems capacity to handle risks of fraud and corruption throughout the Program implementation 61](#_Toc377842503)

[5.3.3 Integrity issues within the Croatian health sector supported through the Program 62](#_Toc377842504)

[5.4 Risk Screening Form: the result of the initial phase of the ESSA process 64](#_Toc377842505)

# Executive Summary

THE PROGRAM’S CONTEXT

The Government of the Republic of Croatia and the World Bank are currently engaged in the preparation and development of a Program-for-Results (PforR) loan named “Improving Quality and Efficiency of Health Services in Croatia” (hereinafter Program).

The Program is in line with the adopted National Health Care Strategy 2012–2020 (NHCS, 2012) which identifies the strategic problems and priorities for the HealthCare sector in the country. The Strategy was adopted by the Croatian Parliament in 2012. Further on, its findings, objectives, priorities and measures were verified through a wide consultation process involving almost 300 experts and representatives of all key and all other interested stakeholders, from professionals within the system to the widest public and patients.

The baseline situation addressed by the Program is well indicated by the following five main strategic problems of the Croatian HealthCare system identified by the Strategy: 1) Poor connectivity and insufficient continuity within the HealthCare system; 2) Uneven or unknown quality of HealthCare; 3) Insufficient efficiency and effectiveness of the HealthCare system, 4) Poor or uneven accessibility of HealthCare, and 5) Relatively poor health indicators. The fact that system is also financially unsustainable (as indicated by constant deficit and accumulated debts which pose substantial burden on the government budget), while at the same time there is also great amount of dissatisfaction with the system (patients complaining on long waiting lists and poor accessibility of the services; employees are currently involved in prolonged strike unsatisfied with their status) indicates great urgency and inevitability of reforms that would start solving above listed problems.

THE PROGRAM FOCUS AND EXPECTED OUTCOMES

The Program will support implementation of five out of the eight Strategic Priorities defined in the Strategy. More concretely, the priority measures / activities, which will be supported by the Program, are focusing on the following three main areas: 1) the health facility network, which will be rationalized – i.e. reorganized, right-sized, optimized, modernized, better managed – in order to become more efficient and effective in providing services better tailored to the needs of the citizens; 2) the HealthCare offered to the population, the quality of which will be improved by means of more rational resource allocation practices and better standards and quality controls mechanisms which will allow the offer of higher guarantees to users; 3) the financial stability of the health sector, which will be promoted.

The Program’s expected outcomes are specified by the following ten Disbursements Linked Indicators: 1) number of acute care beds reduced by 20% by their either conversion in social or palliative or daily or long-term beds, or closure; 2) implementation of two pilot substantial “hospital reshaping schemes”; 3) financial consolidation of 80% of hospitals; 4) 15% (the baseline is 0%) of all surgeries included in the pre-defined lists of elective surgeries performed as ambulatory surgeries; 5) 40% (the baseline is 0%) of rationalized hospitals, among the best performing hospitals based on explicit key performance indicators (KPI) and quality indicators (QI); 6) 70% ( the baseline is 0%) of HZZO-contracted hospitals accredited; 7) 90% ( the baseline is 20%) of doctors noncomplying with HZZO prescription patterns engaged on a person-to-person basis in order to discuss probably needed corrections; 8) 60% ( the baseline is 0%) of public procurement made through centralized procurement; 9) 50% (the baseline is 0%) of general practitioners working in group practices; 10) 60% ( the baseline is 0%) of hospitals with surgery wards establishing quality- and safety- related sentinel surveillance schemes.

THE MAIN ESSA CONCLUSION

The general ESSA finding is that the Program, with its focus on patients’ needs, removal of inefficiencies and improvement of the quality of provided HealthCare services, is not a threat, but an opportunity to improve currently unsatisfying environmental and social performances of the Croatian HealthCare system, serving as a framework for thorough integration of environmental and social considerations into the urgent and unavoidable reform processes.

MORE SPECIFIC DESCRIPTIONS OF THE ENVIRONMENT-RELATED SCREENING, ASSESSMENTS AND RECOMMENDATIONS

As the Program is supporting implementation of the priority measures identified by the NHCS, which did not pass Strategic Environmental Assessment procedure explicitly addressing potential environmental issues, implemented Environmental Risks Screening Exercise consisted of: 1) the standard task of identifying and assessing potential environmental impacts of the currently foreseen Program’s activities; 2) environmental screening of the Croatian HealthCare sector in order to check whether there are some environment related priorities associated with the HealthCare sector, overseen by the Strategy and therefore also not foreseen by Program, while theirs importance and urgency fully justifies their inclusion among the sector’s top priorities that should be addressed by the Program.

The screening focused on the two main identified environment-related aspects of the Croatian HealthCare system. The first is that HealthCare in general is energy- and resource-intensive sector with significant environmental footprint and potentially significant negative impacts. The second is that some of its segments – primarily 1) Ministry of Health’s Directorate for Sanitary Inspection; and 2) Health Ecology Service within the Croatian Institute of Public Health and network of Counties Public Health Institutes – play significant roles in the overall national environmental protection system, related to the area of Environmental Health.

The conclusion from the first part of the screening is that the Program has couple of potential minor negative impacts that can be easily avoided by appropriate management and mitigation measures – which includes 1) potential impacts of foreseen small scale reconstruction works; and 2) potential consequences of foreseen outsourcing of non-medical services and transition to more centralized procurement practices. Program, however has many more potential environmental benefits – including most notably 1) expected improvements in environmental performance of the facilities due to their foreseen reconstructions and modernizations; 2) potential benefits coming from foreseen establishment of the quality monitoring and accreditation practice (with included environment-related accreditation standards).

The second part of the screening exercise screened Croatian HealthCare system, looking for measures of the following three types which arguably deserve to enter the Program: A) measures that are greening foreseen Program’s measures, thus securing that there will be no missed opportunities for win-win outcomes, in sense of achieving both desired initial goal and potential environmental goals as co-benefit; B) measures addressing environmental issues whose seriousness requires urgent intervention; and C) measures with the “high returns” on relatively small invested resources.

A number of candidate measures has been identified, partially because the screening of the Croatian HealthCare system was done against the Environmental Best Practice in HealthCare which has been already for more than a decade promoted by WHO and many other organizations under the agenda of the Green HealthCare sector as one of the leaders in transition to more sustainable societies and economies. The measures have been identified in all standard environment-related areas, including: Medical waste management; Radiological safety and radioactive waste; Hospital infections; Occupational safety within medical facilities; Energy efficiency; Green design; Renewable Energy Resources; Water conservation; Green public procurement; Food related measures; as well as related to the functioning of the Ministry’s Sanitary inspection and Health Ecology Services within the Public Health Institutes.

Based on the more thorough analysis and evaluation of the management systems relevant for the identified issues, the following measures are suggested for consideration for inclusion in the Program Action Plan.

First, it is concluded that the currently proposed Program has no potential negative environment-related impacts that should be specially addressed by the Program’s Action plan.

The first recommended measure - TA to Agency for Quality and Accreditation in Health Care and Social Welfare in foreseen implementation of hospitals’ accreditation (in line with the accreditation scheme that includes environment-related accreditation standards) – is a measure required to maximize potential environment-related benefits of the currently proposed Program.

The remaining measures offered for consideration are measures which proactively address identified environment-related priorities and opportunities within the Croatian HealthCare sector, which are however not addressed by currently proposed Program.

Three measures recommended for inclusion in the Program are: 1) TA to Croatian State Office for Radiation and Nuclear Safety in Preparation and implementation of projects improving radiological safety within the medical facilities; 2) TA to the Agency for Quality and Accreditation in Health Care and Social Welfare in establishment of fully operational monitoring of the hospitals’ compliance with adopted mandatory quality standards (which also cover issues of hospital infections and occupational health within the medical facilities); 3) TA to the Ministry in its role of coordinator and facilitator of preparation and implementation of EE projects in the HealthCare sector.

Three additional measures recommended for inclusion in the next upgrade of the NHCS and forthcoming programs supporting its’ implementation are: 1) Establishment of the comprehensive permanent program dealing with the continuous active greening of the Croatian HealthCare sector; 2) Securing sufficient capacity of the Sanitary inspection by reassignment of some staff currently employed in Health ecology service of Public Health Institutes; 3) Upgrading of the Health Ecology Services from current status of the provider of EH laboratory services to the main implementer and coordinator of wider set of standard EH tasks and projects.

MORE SPECIFIC DESCRIPTIONS OF THE SOCIAL ASPECTS-RELATED SCREENING, ASSESSMENTS AND RECOMMENDATIONS

The Program’s social system was assessed as adequate without substantial negative impacts on the society. Overall risk profile is assessed as moderate as the Program is mainly focused on the improvements and better tailoring of the health care services to the needs of the Croatian citizens, better standards and quality control mechanisms offering higher guarantees to the users and promotion of the financial stability of the health sector.

There are no adverse social impacts associated with land acquisition and involuntary resettlement as the Program will not finance any construction of new hospital buildings but rather small rehabilitation works within the existing hospital structures, if deemed necessary.

Though Croatia has appropriate health policies with universal access to preventive and curative health services, the screening of potential social impacts deals with four main themes. The first one is related to the challenges of the proposed organizational changes and likely internal and external resistances to these changes. The second group of considerations of likely social impacts of the Program supported reforms are concerned with the issues related to social inclusion and equity in access to the health care services. The third are issues related to social accountability of the health care system, both in implementation of the foreseen reforms and in the functioning of the reformed system. The forth group of likely social impacts of the Program supported reforms’ are impact on the employees – medical and nonmedical staff within the reformed system.

There are several acts prescribing responsibilities, tools and procedures for health care system reforms. Also framework for the envisioned changes is defined by the Health Care Act, the Compulsory Health Insurance Act and Patient’s Rights Protection Act. Key documents which have to be changed and adjusted, with the Program objectives and basic health care principles, are the National Health Plan (NHP) as the medium-term planning tool, the Plan and Program of Health Care Measures and the National Health Care Network. Based on the present legal and organization framework key taskforce stakeholders for the Program implementation are defined and risk of significant negative impacts are limited.

The health care system changes are based on participatory approach. Patients’ rights protection procedures and grievance mechanism are developed and provide significant level of public accountability. Positive examples are the National Health Care Strategy 2012-2020 development process, meetings of patients’ representatives once a week with the Minister and public free phone services for patients’ complaints so-called “White phone” (Bijeli telefon) established by the Ministry of Health. A patient who considers that one of his/her rights has been violated may make a complaint to the head of the health care institution in which the alleged violation took place. Further, patients who are not satisfied with the measures taken to protect their rights can seek further their rights from a relevant professional chamber or the Minister of Health (via e-mail or phone).

There are several legal sources for regulating potential retrenchment /lay-offs of the medical or non-medical staff, including the Labor Act, the collective agreements or specific measures/ program developed for specific workforce group.

The National Health Care Strategy 2012-2020 addressed possible threats for future reforms: lack of understanding and rejecting the need for reform measures, undermined trust in public sector institutions and regionally uneven economic strength. However, there are ongoing projects like development of a hospital master plan, a health human resources strategy and specific projects in the area of information and communication technology (ICT) aimed at improving the management of the health system which could bridge recognized gaps and threats.

# Description of the Program with an identification of its environmental and social aspects and potential impacts

## Program’s objectives, scope and activities

The Government of the Republic of Croatia and the World Bank are currently engaged in the preparation and development of a Program-for-Results (PforR) loan named “Improving Quality and Efficiency of Health Services in Croatia” (hereinafter the Program).

The Program supports the recently adopted National Health Care Strategy 2012–2020 (NHCS, 2012) which identifies the strategic problems and action priorities for the HealthCare sector in the country. Further on, its’ findings, objectives, priorities and measures were verified through a wide consultation process involving almost 300 experts and representatives of all key and other interested stakeholders, from professionals within the system to the widest public and patients.

The Table 1 bellow lists the strategic problems of the Croatian Health Care System identified in the Strategy, which also demonstrate the issues the Program will tackle.

Table 1. Five strategic problems of the Croatian Health Care System identified in *NHCS 2012–2020* (NHCS, 2012)

|  |  |
| --- | --- |
| STRATEGIC PROBLEM | SOME OF THE KEY ASPECTS OF THE PROBLEM |
| Poor connectivity and insufficient continuity within the HealthCare system | * Information systems developed in isolation (some 60 different registries within the system) do not allow analysis involving data from various systems, which is required for more efficient and effective management, including staff sharing, common use of equipment, unified procurement, cooperation between primary HealthCare and hospitals, between doctors and pharmacists etc.;
* Poor connectivity and comprehensiveness in primary HealthCare, poor cooperation among teams, almost no group practices and interdisciplinary teams;
* Unclear continuity across the three levels of HealthCare, with patients often skipping primary level and going directly to the tertiary level, and/or tertiary level dealing with treatments that could be more efficiently dealt with on the secondary level;
* Poor vertical continuity in education of the medical professionals; medical school graduates better equipped for work on secondary and tertiary level than on the primary level of the HealthCare.
* Insufficient connection of the system with its wider social context (civil society, other sectors of government)
 |
| Uneven or unknown quality of HealthCare | * Despite some efforts, no medical facility with external accreditation of HealthCare quality; poor capacity for systematic monitoring, analysis and measurement of quality; Labor law inappropriate for awarding of a good and sanctioning of a poor quality work; no quality and result based financing of medical facilities;
* Poor effectiveness of established QC mechanisms in hospitals; Unclear, partially unfeasible or obsolete Quality Standards and Norms;
* No validated accreditation standards; insufficient capacity of the established Agency for Quality and Accreditation in Health Care and Social Welfare, no systematic monitoring and collection of data for quality indicators; existing data suggest uneven quality of HealthCare in medical facilities;
* Unregulated employment of medical professionals in medical facilities and schools, as well as increased number of medicine students and programs causing lower quality of education
 |
| Insufficient efficiency and effectiveness of the HealthCare system | * Low efficiency both on the HealthCare supply and demand sides: on the supply side mainly caused by financing based on capacities and inputs (payments per occupied bed in hospitals, or per registered patient in primary HealthCare); on demand side caused by population ageing and existing health insurance system with low proportion of individual co-payments and many categories of citizens exempted from co-payments, thus encouraging greater demand for health services;
* General low transparency of HealthCare system financing; poor management of the medical facilities caused partially by lack of staff with appropriate interdisciplinary expertise, partially by lack of established framework allowing performance monitoring, analysis, planning and management; spending on medicaments too high and often unjustified, partially caused by lack of formal Health Technology Assessment system (HTA) and clinical guidelines; payment period too long.
* Health facility network not sufficiently tuned neither to changing needs created by epidemiologic and demographic shifts in Croatia nor to advances in medical technologies
* Hospitals infrastructure too large, poorly maintained, with low energy efficiency.
* Sophisticated expensive equipment commonly used only during one work shift; expensive acute beds often used for long-term and palliative care; Capacities of Emergency Medical Service often used for transport of the patients; insufficient focus on prevention, insufficient use of pharmacists’ expertise in HealthCare, particularly in order to rationalize use of medicaments.
* No monitoring and control of job attendance
* Despite objective lack of medical staff within the system, the existing human resources could be used more efficiently: no task shifting from doctors to nurses; low staff mobility within the system; almost completely unregulated and undeveloped voluntary work.
 |
| Poor or uneven accessibility of HealthCare | * Shortage of medical staff within the system is structural problem that causes lower accessibility of HealthCare, especially in rural areas and on islands, however also in some smaller urban centers. The situation could even worsen because of the relatively high average age of medical staff and decreased number of young professionals entering the system.
* Medical professions becoming less attractive; particularly some jobs within the system that are proportionally less paid; or for specializations for which education has to be self-financed.
* Network of pharmacies poorly developed in rarely populated area in which it is not profitable.
* Although officially all citizens have rights on all HealthCare services, in reality there are great discrepancies in accessibility, partially due to insufficiently transparent waiting lists; Plan and program of the HealthCare services from the mandatory health insurance is obsolete, too wide and hard to fulfill in reality.
 |
| Relatively poor health indicators | * Although general mortality rate and specific mortality rate from some diseases are falling, they are still higher than EU averages;
* Especially worrying is current situation related to the health behavior within the population and associated risk factors (smoking, too high body weight, alcohol abuse), indicating poor culture of taking responsibility for one’s health;
* Toughening economic and social situation presents further threat to the population general health.
 |

The fact that system is also financially unsustainable (as indicated by constant deficit and accumulated debts which pose substantial burden on the Government budget[[1]](#footnote-1)), while at the same time there is also great amount of dissatisfaction with the system (patients complaining on long waiting lists and poor accessibility of the services; employees are currently involved in prolonged strike unsatisfied with their status) indicates great urgency of reforms that would tackle above listed problems.

The Program *Improving Quality and Efficiency of Health Services in Croatia* will support implementation of five out of the eight Strategic Priorities defined in the Strategy: SP2 – Strengthening and better use of the human resources within the HealthCare system; SP3 – Strengthening of the management in the HealthCare system; SP4 – Reorganization and restructuring of the health facilities network; SP5 – Promotion of the quality in the HealthCare system; SP7 – Financial stability / sustainability of the system.

More concretely, the priority measures identified by the Strategy, which will be supported by the Program, are focusing on the following three main areas for which the actions are presented in table 2:

1. The health facility network, which will be rationalized – i.e. reorganized, right-sized, optimized, modernized, better managed – in order to become more efficient and effective in providing services better tailored to the needs of the citizens;
2. The HealthCare offered to the population, the quality of which will be improved by means of more rational resource allocation practices and better standards and quality controls mechanisms which will allow the offer of higher guarantees to users;
3. Financial stability of the health sector, which will be promoted.

Table 2. The Strategic actions included in the Program, grouped in the three main areas.

|  |  |
| --- | --- |
| THE PROGRAM’S FOCUS AREA | THE STRATEGIC ACTIONS INCLUDED IN THE PROGRAM  |
| **Rationalized – more efficient and effective – health facility network, better tailored to the needs of the citizens** | Development and implementation of the Hospital Master Plan (HMP) which will define regional networks that will use existing resources and capacities more efficiently and effectively. It includes: restructuring, reshaping, merging of the existing facilities with all associated governance and management changes (including no major physical works but only on-need-basis reconstruction and modernization of the existing facilities); increasing the provision of secondary specialized ambulatory diagnostic and treatment services intensifying the use of non-invasive diagnostic and treatment procedures; expanding day care services and ambulatory services; increasing the long term care for palliative and rehabilitation services and social care that will be delivered through specialized units/facilities; decreasing the number of acute care beds which are currently being used for services which could be more efficiently and effectively provided by aforementioned specialized facilities.. **DESIRED IMPACTS**: the service delivery model adjusted to population needs and existing resources (HR and technology); the health facility network delivering an optimal mix of services in the right place at the right time; the health facilities are endowed with a clear institutional status, competent professionals to manage them, and the corresponding tools. |
| **Improved, standardized, controlled and verified quality of HealthCare services** | Improvement of the quality, equity, continuity, and co-ordination of care across the health system by development of clinical protocols and care pathways for more frequent health problems, including also standards needed to implement quality control mechanisms, to lead the access to the different levels within the referral networks and to train and retrain the human resource. Implementation of technical/clinical audits and payment mechanism to monitor and incentivize the use of clinical guidelines; detecting and recording of specific “sentinel events for quality” within a fully implemented surveillance system.Implementation of a hospital accreditation mechanism as a condition to remain in operation.Implementation of HTA (Health Technology Assessment system) as a support to decision makings on public resource allocation. **DESIRED IMPACTS**: the patients’ satisfaction increased by a perception of increased responsiveness; the health status of the population improved; and regional disparities in health outcomes declined. |
| **Promoted financial sustainability of the health sector** | Reducing costs and increasing efficiency by: deeper implementation of central procurement of medical and nonmedical supplies, including framework contracts and potentially e-procurement; outsourcing of non-medical services; a review of comparative costs of different modalities of care (ambulatory compared to inpatient procedures) in search for cost-effective savings in order to adjust amounts to be paid for each; strengthened performance-linked component in payments to hospitals and primary care to create incentives to reduce referrals and improve quality of care;Building MoH capacity for preparation of projects proposals for financing by EU structural funds.**DESIRED IMPACTS**: improved system’s efficiency and a reduction of total public expenditures in health as proportion of total public expenditures.  |

Clearly, the most tangible and specific description of the Program’s expected outcomes is given by its set of Disbursement Linked Indicators (DLIs) – i.e. the set of targets whose fulfillment trigger release of the specified percentage of Program’s loan – listed in the Table 3.

Table 3. Disbursement Linked Indicators (DLIs) of the Program-for-Results “Improving Quality and Efficiency of Health Services in Croatia”

|  |
| --- |
| **DLI 1.** The total number of acute care beds reduced from the baseline of 15,930 (paid by the HZZO) to 12,800 by converting some of them into “social beds,” “long-term” or “palliative care” beds,” “day care posts,” or closing them down. |
| **DLI 2.** At least two substantial “hospital reshaping scheme” subprojects implemented[[2]](#footnote-2).  |
| **DLI 3.** Percentage of hospitals that became financially consolidated (with zero debt during the preceding year) within the redefined institutional architecture, in line with the Master Plan. |
| **DLI 4.** Percentage of all surgeries included in the predefined lists of elective surgeries performed as ambulatory surgeries in the last six months.  |
| **DLI 5.** Percentage of rationalized hospitals (as defined in the hospital rationalization master plan), among those contracted by the HZZO and subject to technical audit in the previous year, publicly disclosed as best-performing hospitals based on explicit key performance indicators and quality indicators to manage NCDs as defined by the HZZO. |
| **DLI 6.** Percentage of HZZO-contracted hospitals accredited by AQAHS through an independently run accreditation process. |
| **DLI 7.** Percentage of doctors for whom HZZO-defined prescription patterns in the last six months was found to be “non-satisfactory” and with whom a corrective course of action was discussed on a person-to-person basis. |
| **DLI 8.** Percentage of total public spending on medical consumables, drugs, and devices for hospital (inpatient and outpatient) services made through centralized procurement/framework contracts and disclosed on the Ministry of Health website in simplified and understandable format. |
| **DLI 9.** Percentage of general practitioners working in group practices. |
| **DLI 10.** Percentage of hospitals with surgery wards that have established quality- and safety-related sentinel surveillance schemes reporting the rates of specific events: (a) avoidable, non-traumatic, diabetes-related lower-limb amputations; (b) postoperative pulmonary embolism; and (c) deep vein thrombosis. |

Regarding the type of activities, specified focus areas and targets / DLIs suggest mainly activities dealing with changes in organization, procedures and management that should bring improved efficiency, effectiveness and quality. Some physical works can be expected as part of reorganization / rightsizing / modernization of the health facility network, however dealing exclusively with reconstruction of existing premises, or some minor reconstructions/ upgrades/ modifications to the existing premises improving theirs overall functionality.

## Key participating agencies

The section defines Ministry of Health as a key implementing agency of the Program and in addition identifies other stakeholder that will participate directly in the implementation of the Program.

### The lead partner and main coordinator of the Program implementation: Ministry of Health (MoH)

At the central level, the MoH is responsible for: (i) health policy, planning and evaluation, including the drafting of legislation, regulation of standards for health services and training; (ii) public health programs, including monitoring and surveillance of health status, health promotion, food and drug safety, and environmental sanitation; and (iii) regulation of capital investments in HealthCare providers in public ownership. In particular, it draws up legislation, produces the annual national health plan for the country, monitors health status and HealthCare needs, sets and regulates standards in health facilities and supervises professional activities such as training. Also MoH coordinates the health related projects which will be funded by EU funds or other IFIs. The MoH manages public health activities including sanitary inspections, supervises food and drug quality and engages in the promotion of health education of the population. It also nominates the chairs of the governing councils and appoints the majority of the board members in state-owned HealthCare facilities.

### Other key stakeholders

#### Ministry of Finance

The Ministry of Finance is responsible for the planning and management of the government budget, which includes the approval of the central budget transfers to the CHIF as well as the MoH, determining the overall level of public spending on HealthCare.

#### Croatian Health Insurance Fund (CHIF)

Established in 1993, the CHIF is the single health insurance fund in the mandatory health insurance (MHI) scheme is responsible for contracting HealthCare services provided within the MHI scheme. The CHIF is also responsible for the distribution of sick leave compensation, maternity benefits and other allowances as regulated by the Croatian Health Insurance Act. The CHIF also plays a key role in the definition of basic health services covered under statutory insurance, the establishment of performance standards and price setting for services covered under the MHI scheme.

#### Agency for Quality and Accreditation in Health Care and Social Welfare

Agency was established pursuant to the Act on Quality of Health Care and Social Welfare (OG124/11). Its responsibilities and activities include: 1) implementation of a mandatory system of quality and safety for all HealthCare providers[[3]](#footnote-3); 2) establishment of an accreditation system[[4]](#footnote-4), first for secondary and tertiary HealthCare, and then for primary HealthCare and public HealthCare; 3) education, development and research related to the HealthCare protection quality and patient safety; 4) health technology assessment; and 5) supervision over health insurance standards.

#### The Croatian National Institute of Public Health (CNIPH) and county institutes

The CNIPH main activities include: provision of statistical research on health and HealthCare services; maintaining public health registers; monitoring and analysis of the epidemiological situation; provision, organization and conduct of preventive and counter-epidemic measures; planning and control of disinfection and pest control measures; planning, control and evaluation of the implementation of compulsory immunizations; provision of immune-biological activities of national interest; testing and control of the safety of drinking water, waste water, food and common use objects; and other public health activities requested by the MoH.

#### Counties and the city of Zagreb

Local governments own and operate most of the public primary and secondary HealthCare facilities, including general and special hospitals, county health centers, public health institutes and community health organizations (home care and emergency care units). While these facilities receive operating expenditure through their contracts with the CHIF, local authorities are responsible for financing the maintenance of their infrastructure and, increasingly, for capital investments. After Government’s decentralization policy, the local governments they have been in charge of granting concessions for public HealthCare services at primary level. Since 2012, MoH implements program for hospital financial consolidation. As a part of that process, all local governments whose hospitals are involved in the program have to transfer their governing rules and responsibilities to the MoH which appoints new governing council.

#### Professional chambers

Croatia has statutory HealthCare professional chambers for physicians, dentists, pharmacists, biochemists, nurses, midwives, physiotherapists, logopeds and one integrated for the group of professions. All the chambers are established by the relevant faculties and professional associations. All university-educated health professionals and nurses must have membership in one of the chambers. The chambers are responsible for professional registration and maintenance of professional standards. The chambers also express professional opinions on a variety of issues and provide advice on licensing of private practices and on opening and closing of health institutions.

#### Alliance of Patients' Organizations /KUZ- Koalicija udruga u zdravstvu/

Alliance of Patients' Organizations is the umbrella coalition of patients associations and NGO-s and coordinates most of them. The Alliance participates in all key debates and projects related to the HealthCare issues.

#### Ministry of Social Policy and Youth (MSPY)

MSPY is responsible for the planning, monitoring and stewardship of the entire system of social protection services. Among duties, key responsibilities related to the Program are institutional services and benefits or allowances which could have direct impact to the equity in health.

#### Ministry of Labor and Pension System (MLPS)

Ministry of Labor and Pension System combines in one place all the rights related to employment, labor relations and pension insurance. Ministry of Labor and Pension System prepares and proposes measures, activities and strategies in the areas of employment, labor market and active employment policy, health and safety of workers, mandatory and voluntary pension and social security, social dialogue and the preparation and implementation of programs and projects under the European Union. Ministry of Labor and Pension System is responsible for the social partnership and relations with trade unions and employers' associations in the field of labor relations, labor and employment.

#### Trade unions (for Health Care Workers)

Trade unions are organized around three key professional groups: medical doctors, nurses and other HealthCare workers. They negotiate with government as independent or allied stakeholders.

## Program’s potential social and environmental impacts

### ENVIRONMENTAL SCREENING

As the Program supports implementation of the priority measures identified by the NHCS, and as the Strategy did not undergo Strategic Environmental Assessment procedure explicitly addressing potential environmental issues[[5]](#footnote-5), implemented Environmental Risks Screening (ERS) exercise tackled two issues: a) the standard ERS task of identifying and assessing potential environmental impacts of the currently foreseen Program’s activities, and b) checking whether there are some environment related priorities associated with the HealthCare sector, overseen by the Strategy and therefore also by Program, whose importance and urgency fully justifies their inclusion among the sector’s top priorities that should be addressed by the Program.

In the next three sections are structured in the following way:

First, the main environment-related aspects of the Croatian HealthCare sector are identified.

Second, the potential environmental impacts of the currently foreseen Program activities are identified and assessed.

Third, more comprehensive and detailed analysis of the various environment related aspects of the Croatian HealthCare sector is done in order to identify potentially overseen priorities that merit inclusion among the Program activities.

#### Environment related aspects of the Croatian HealthCare system

The Croatian HealthCare system is connected to the subject of environment in the two main ways.

1. **The HealthCare sector in general is energy- and resource-intensive sector with significant environmental footprint and potentially significant negative impacts**. More specifically, medical facilities consume significant amount of energy, water, food, cleaners, pharmaceuticals, various chemicals and equipment containing toxic and radioactive materials. On the output side, it generates significant amounts of waste, including hazardous medical waste, radioactive waste, wastewater and emissions into air. In the extreme case of environmental malpractice, medical facility presents infection threat to surrounding area. The existing data on waste generation (recent reports issued by Environmental protection agency and Environmental protection inspection) and on resource efficiency (findings of the UNDP House in order project) assessed inefficiency, i.e. saving potential of up to 30-50%.
2. **The Croatian HealthCare system** **plays significant roles in the overall national environmental protection system**, **more precisely in the area of environmental health[[6]](#footnote-6)**, which is important segment of the MoH mandate in protection of the public health interest.

The two entities within the system with significant mandates in environmental health issues are:

1. MoH’s Directorate for Sanitary Inspection; and
2. Health Ecology Service within the Croatian National Institute of Public Health and network of Institutes at regional / county level

These two are actually the main providers of the environmental health services, implementing environmental health policies through monitoring and control activities; they carry out that role by promoting the improvement of environmental parameters and by encouraging the use of environmentally friendly and healthy technologies and behavior. The Directorate for Sanitary Inspection is in charge of control, i.e. inspection following tasks: water and air quality, food safety, common use items safety, chemical safety, safety related to biocides and other toxic materials, protection from noise pollution, protection from ionizing and nonionizing radiation. The Health Ecology Service is traditionally (and still in reality) the main provider of environmental health laboratory services, the backbone of official control and monitoring of environment and human health in Croatia, as it provides services related both to the control required by the law and performed by different inspections, and to the official monitoring programs.

#### Screening impacts of foreseen Program’s activities

A Program identifies broad measures and objectives whose success of implementation is monitored through Disbursement Linked Indicators (DLIs) associated with target values. The does not precisely elaborate activities or manners in which these targets and objectives are to be achieved. For that reason, when screening Program for its potential environmental impacts, the DLI’s are used as the most tangible and specific descriptors of both Program expected outcomes and associated activities.

Based on the Environmental Screening Process, the Program has couple of potential minor negative impact that can be easily avoided by appropriate management and several important potential environmental benefits. Overall, the Program will have positive environmental impact.

Namely, the Program calls for reconstruction of hospitals which will inevitably lead to some sort of construction or rehabilitation works, while these types of activities might have direct though site specific impact on the environment, as even the small construction works are associated with municipal, medical and construction waste management issues, hazardous and non-hazardous material management, traffic and pedestrian safety, wastewater issues, historical heritage issues and different type of nuisances like noise, dust (air pollution), etc. It is however very unlikely that these activities would have significant negative impact on the environment, as only smaller construction works like rehabilitation, reconstruction and adaptation of existing buildings is foreseen within the Program, and experience with similar works in Croatia proves that relevant regulatory and institution framework is sufficient to guarantee environmentally sound management and outcomes. The relevant environmental management systems will be further elaborated and assessed in the following chapters.

The second type of the potential negative environmental impacts of Program is related to insufficiently well-thought-out and managed rationalization in procurement and outsourcing of the non-medical services. However, these impacts, although should be kept on mind, are easily avoided through proper preparation and management, therefore they do not require further more detailed elaboration in the following chapters, i.e. assessment phases.

On the other side, the Program will result with many environmental benefits, most notably of the following two kinds.

First, the facilities rehabilitation in accordance with the most recent building standards (e.g. related to materials used, energy efficiency, etc.), design requirements and practice, as well as modernization of the equipment will positively affect the facilities’ environmental efficiency. This positive environmental impact does not require further elaboration as it is practically unavoidable consequence of the facilities’ modernization in nowadays more environmentally advanced policy and technological context.

Second, a foreseen establishment of the quality monitoring, control, reporting and accreditation system and practices creates context for more systematic and comprehensive treatment of the sector’s environment performance as well. However, capitalization of this opportunity is far from being guaranteed, as the establishment of the quality monitoring and accreditation practice is itself very complex and challenging task. Therefore, for this issue too, the relevant environmental management systems will be further elaborated and assessed in the following chapters.

Table 4 summarizes findings of Environmental Risks Screening of the Program, as specified by its DLIs (see for details Table 3). The assumed Program’s activities associated with each of the DLI’s were assessed for their potential:

1) Direct environmental impact;

2) Impact on HealthCare sector ecological footprint;

3) Impact on HealthCare sector’s capacity as an important actor in environmental protection in Croatia.

Table 4. Environmental Risks Screening of the Program

|  |  |  |
| --- | --- | --- |
|  | **Potential Program’s direct environmental impacts and Implications for Health sector as resource consumer and polluter** | **Potential Program’s Implications on the Health sector as an important actor in environmental protection in Croatia** |
| **DLI 1**. The total number of acute care beds reduced from the baseline of 15,930 (paid by the HZZO) to 12,800 by converting some of them into “social beds,” “long-term” or “palliative care” beds,” “day care posts,” or closing them down. | **++*** **Foreseen facility network with less acute care beds**, i.e. their substitution by more day care services and ambulatory services, with consequent decrease in number of patient-days within the hospital, decreases the facilities’ overall ecological footprint.
* Environmental efficiency of the sector (waste, energy, etc.) in relationship to physical works can only be improved in the process because of the more demanding nowadays environmental standards and requirements.

-* Potentially required **physical works,** within the existing institutional regulatory context, are expected to have easily mitigated short term and site specific direct environmental effects
 | **0*** activities implied by this DLI are not targeting any of the sector’s segments with a role in the environmental protection in Croatia
 |
| **DLI 2.** At least two substantial “hospital reshaping scheme” subprojects implemented. | -* **Physical works associated with the reconstruction** are dealing exclusively with reconstruction of existing premises, or some minor upgrades/ modifications to the existing premises improving theirs overall functionality. As the management framework relevant for the issue (small scale construction works) is well functioning in Croatia, potential impacts are expected to be easily mitigated, short term and site specific.

++* **Planned rationalization, reorganization, modernization and reconstruction** is also an opportunity for implementation of some of the listed resource efficiency (e.g. Energy Efficiency; alternative energy sources, green building design, water conservation) measures;
 | 0* same as for DLI1
 |
| **DLI 3.** Percentage of hospitals that became financially consolidated (with zero debt during the preceding year) within the redefined institutional architecture, in line with the Master Plan. | +* Financially sound system has less risk of some environmental accidents caused by lack of funds for necessary resources.
* Environment which promotes financially prudent operations, actively seeking for higher financial efficiency will support measures for increased resource efficiency (e.g. Energy efficiency) as they in mid-term or long-term have cost-cutting co-benefits

-* Foreseen rationalization costs cutting activities will probably include gradual / partial outsourcing of the non-medical services. If done in haste, not sufficiently prepared and thought through, it can result with deterioration of the quality of the services and negative impact on environmental health issues (e.g. cleaning and disinfection services provided by operator lacking experienced and trained personnel can result in increase in hospital infections’ incidence). Clearly, this potential impact is easy to mitigate by well-prepared transition.
 | 0* same as for DLI1
 |
| **DLI 4.** Percentage of all surgeries included in the predefined lists of elective surgeries performed as ambulatory surgeries in the last six months. | +* shortening of the patients’ stay in the medical facility decreases ecological footprint
 | 0* same as for DLI1
 |
| **DLI 5.** Percentage of rationalized hospitals (as defined in the hospital rationalization master plan), among those contracted by the HZZO and subject to technical audit in the previous year, publicly disclosed as best-performing hospitals based on explicit key performance indicators and quality indicators to manage NCDs as defined by the HZZO. | +* better managed, high general performance, high quality medical facility commonly also has better environmental performance
 | 0* same as for DLI1
 |
| **DLI 6.** Percentage of HZZO-contracted hospitals accredited by AQAHS through an independently run accreditation process. | **++** * This will further contribute to compliance with environmental legislation and general energy, resource and environmental efficiency, as accreditation criteria include environment related criteria (more precisely, current draft of the new version of the accreditation criteria includes criteria related to waste management, energy efficiency, general prudent resource management, prevention, control and abating of hospital infection, environmental risk management
 | 0* same as for DLI1
 |
| **DLI 7.** Percentage of doctors for whom HZZO - defined prescription patterns in the last six months was found to be “non-satisfactory” and with whom a corrective course of action was discussed on a person-to-person basis. | +* it includes support to more rational drugs prescription practice, which eventually leads to less medicaments disposed in environment (through waste water or municipal solid waste)
 | 0same as for DLI1 |
| **DLI 8.** Percentage of total public spending on medical consumables, drugs, and devices for hospital (inpatient and outpatient) services made through centralized procurement/framework contracts and disclosed on the Ministry of Health website in simplified and understandable format. | +* centralized procurement practice facilitates gradual introduction of the greener procurement practices in the system

-* if implemented inefficiently, reorganization of procurement processes can cause problems – primarily delays because of more complicated procedure; lack of responsiveness in the central procurement unit on specific needs of numerous users within the system) – in acquiring of the goods and services required for environment-responsible functioning of the system
 | 0same as for DLI1 |
| **DLI 9.** Percentage of general practitioners working in group practices. | 0* implied activities has no associated environmental impacts
 | 0same as for DLI1 |
| **DLI 10.** Percentage of hospitals with surgery wards that have established quality- and safety-related sentinel surveillance schemes reporting the rates of specific events.  | +* It contributes to quality of the HealthCare services, which shortens patient’s stay within medical facility, and probability for prolonged stay caused by avoidable complication, which in turn decrease facility’s ecological footprint.
 | 0same as for DLI1 |

LEGEND: +++ major positive impact; ++ positive impact; + minor positive impact; 0 neutral / no associated impacts; - potentially minor negative impact; -- negative impact; --- major negative impact.

#### Screening environment related aspect of the Croatian HealthCare system for potential issues that merit inclusion on the list of priority problems addresses by the Program

Fully appreciating the Program’s approach that narrowed focus of its’ intervention on the sector’s top priorities in order not to disperse the system’s capacities, resources and attention on too many reform tasks, the HealthCare sector, operating in line with a well-known credo of “first, do not harm”, cannot afford not to seriously integrate care for environment in its operations. A further argument for serious consideration of the system’s environmental performance and possible ways to improve it is the fact that such improvements commonly have significant health, economic and social co-benefits – which are all very much in line with the Program objective of improved quality, efficiency and accessibility of the HealthCare sector. Therefore the second part of the screening exercise is screening Croatian HealthCare system against the standard set of HealthCare environment related aspects, assessing whether current situation requires Program’s attention.

Covered set of HealthCare environment related aspects are those that commonly appear in number of the most well-known healthcare sector greening initiatives, including Health Care without Harm international coalition; Practice Green Health Network; British Centre for Sustainable Healthcare). E.g., a recent publication issued by the World Health Organization – *Healthy hospitals, healthy planet, healthy people* – recognizes that health sector, as one of the most trusted and respected sections of society and one of the largest employers and consumers, has both a responsibility and an opportunity to play a leading role in ongoing transitions to more environmentally sustainable economies and societies. The publication also provides a list of already proven measures, as well as examples of medical facilities that successfully implemented these measures, which **improved environmental efficiency**, with significant health, economic and social co-benefits. The listed measures include:

* Establishment of the formal environmental management system as a framework for organization and implementation of all aforementioned measures, creating synergy that increases efficiency and effectiveness of them all. Such system also secure framework for suitable engagement and support of the top level leadership.
* Waste management measures such as proper management of the hazardous medical waste (infectious, chemicals, radioactive, toxic, etc.); waste minimization by purchas­ing goods with less packaging, using reusable rather than dispos­able products; selective waste collection, recycling, com­posting
* Water conservation measures such as using of water-efficient fittings and technologies, monitoring of water use and quick repair of leaks, eliminating purchase and sale of bottled water where high quality potable water is available, using partially recycled waste water for irrigation, landscape design that does not require intensive irrigation, etc.
* Energy Efficiency Measures, such as better insulation of buildings, installation of the highly efficient modern Combined Heat and Power (CHT) technologies, switching to more efficient lighting and other electrical appliances, installation of energy-saving gadgets such as motion sensor lighting and automatic doors, switching thermostat heating and cooling temperature by couple of degrees, reducing “stand-by” energy use;
* Green building design measures such as suitable siting and orientation, use of environment friendly construction materials; green landscape on the site; use of day lighting and natural ventilation, green roofs, etc.;
* Alternative energy generation on site, primarily solar panels and / or biomass boilers for heat generation and pumping and heating water;
* Replacement of currently used toxic materials with their non-toxic or less toxic substitutes;
* Effective transportation measures such as effective siting and programming of medical care delivery, using high-efficiency or alternative-fuel vehicles, training and incentivizing staff in fuel-efficient driving, establishing necessary infrastructure and encouraging hospital staff and patients to use bicycles, public transportation and carpools;
* Food related measures such as increasing percentage of seasonal, non-processed, fresh, locally produced, organic products, decreasing amount of meat in hospitals menus, minimizing and composting food waste; Green procurement practice, which includes integration of the environmental / sustainability criteria when selecting goods and services for purchase. As a major consumer, medical facilities have both responsibility to decrease their own ecological footprint, and high leverage power in creation of markets for greener goods and services;

The screening identified three different types of the measures which arguably deserve to enter the Program:

1. Measures that are greening foreseen Program’s measures, thus securing that there will be no missed opportunities for win-win outcomes, in sense of achieving both desired initial goal and potential environmental goals as co-benefit
2. Measures addressing environmental issues whose seriousness requires urgent intervention;
3. Measures with the “high returns” on relatively small invested resources.

Table 5 lists candidate issues / measures of these types, related to various aforementioned environmental themes relevant for the HealthCare sector. This is an assessment of the current situation in order to identify issues and associated corrective measures that, based on some of the three predefined criteria, merit their inclusion into the Program.

Table 5. Environmental Screening of the Croatian HealthCare system

| **ENVIRONMENTAL THEME** | **Comment of the situation within Croatian HealthCare sector and candidate measures for inclusion into the Program** |
| --- | --- |
| **THEMES RELATED TO CONTROL AND PREVENTION OF THE POLLUTION CAUSED BY HEALTHCARE SYSTEM** |
| 1. **Medical waste management** | Regarding the wider context of the general waste management system, the fair estimate is that the relevant Croatian legislation is harmonized with the EU *acquis*; however, the practice is lagging in behind the EU average. A problem of illegal dumpsites is mainly solved, with majority of waste ending on some of the official landfills. However, practice of selective waste collection is considered weak (with exception of PET and glass bottles), official landfills in poor condition, with insignificant waste processing capacities. Recently adopted Sustainable Waste Management Act (OG 94/13), with more emphasis on selective collection, clearly defined responsibilities, sanctions, and control mechanisms, is expected to significantly improve situation, starting from January 1st 2014. Medical waste management is more precisely defined by Ordinance on Medical Waste Management (OG 72/07). According to the Environmental Protection Agency report on medical waste from 2012, around 2500t of hazardous medical waste is reported annually to the official Register of Environmental Polluters.Medical waste management system is relatively well established within all larger medical facilities in Croatia, according to findings of Croatian Environmental Inspection, based on comprehensive series of inspections implemented in period 2008-2010, which covered all medical facilities within the public HealthCare system, as well as all major ones from private sector[[7]](#footnote-7). The Inspection’s assessment was confirmed in interview with representative of the company authorized for the medical waste management (collection, processing and disposal), which however emphasized that situation is less perfect with smaller (less than 200kg of hazardous medical waste per year), private medical facilities that are often only formally fulfilling their legal obligation (signing contract for medical waste removal with authorized company), however, in order to pay less, they report only a smaller portion of the total waste quantity, while the remaining part is disposed as municipal solid waste. Due to the large number of smaller facilities and not sufficient Environmental Inspection capacity, regular supervision is considered inadequate. The other area, in which Environmental Inspection identified irregularities, is processing and final disposal of the medical waste, in a sense that the waste is not processed in a way that makes it harmless before its final disposal on landfills. This aspect is regularly supervised and as a consequence licenses were revoked for several authorized companies.The major space for improvement in waste management practices within the medical facilities in the public HealthCare network is minimization of generated hazardous medical waste quantities through improved selective waste collection – i.e. prevention of mixing of smaller quantities of hazardous waste with larger quantities of non-hazardous waste. The suggested approach, with effectiveness proven on a number of examples all over the world, is establishment of comprehensive Environmental Management System as a framework for combination of measures including awareness raising and training of the staff, performance monitoring and control, reporting, improvements in waste collection infrastructure. **The measure could be considered as candidate measure based on all three above listed criteria.** The measurefits well with the foreseen activities related to the quality accreditation within the hospitals, as waste management is one of the themes assessed within the accreditation procedure.  |
| **2. Radiological safety within the medical facility and radioactive waste** | According to the assessment of the Croatian State Office for Radiological and Nuclear Safety, the current level of radiological safety within the medical facility is not satisfactory, neither from the point of the quality of provided HealthCare service in a sense of maximization of benefits from the therapy while minimizing harmful effects of the radiation, nor from the point of environmental safety and occupational safety of the medical staff. Measures required for improvement of the situation includes modernization of the obsolete equipment, acquisition of other currently lacking essential safety-related equipment, education and training of the staff, preparation of the Standard Operational Procedures guaranteeing maximum level of radiation safety. In order to make it eligible for co-financing from EU funds, improvement of radiation safety within the medical facilities should be included in relevant Operational Programs for period 2014-2020. The situation with the radioactive waste – i.e. sources of ionizing radiation from medical facilities which are not anymore actively used – is much better, in a sense that the itinerary of such items are carefully monitored and controlled, and level of compliance within the system is high. The problem is that Croatia has not operative central depot for permanent disposal of radioactive waste, but this problem is out of the scope of the HealthCare system reform. The implementation of the Program will tackle in some hospitals this issue leading to improvements in radiation safety, however, the wider preparation and implementation of projects improving radiation safety with the medical facilities could be considered as **candidate measures based on B and C criteria.** |
| **THEMES RELATED TO ENVIRONMENTAL HEALTH AREA** |
| **3. Hospital infections** | Although the subject of hospital infections and associated subject of hygiene are traditionally considered as more medical than environmental issue, they clearly can be seen also as an environmental health issue within the medical facilities, and if not properly dealt with, even outside the facility. Comprehensive framework for prevention, control and abatement of the hospital infections is established within the Croatian HealthCare sector – including the Ordinance on Preconditions and Implementation of Measures for Prevention and Abatement of the Hospital Infection (OG 85/12, 129/13), which fully transpose all WHO standards and recommendations. However, there is still a lot of space for improvement, most notably related to implementation of the established framework (establishment of dedicated organizational unit staffed with trained personnel, enforced implementation of foreseen measures, better monitoring and reporting, etc.) According the existing data, over 17.000 patients get infected in the Croatian hospitals annually, out of which around 500 die.Technical Assistance to the Agency for Quality and Accreditation in Health Care and Social Welfare in implementation of the full-fledged system as envisioned in the relevant legislation **could be considered as candidate measures based on all three (A, B and C) above listed criteria.** Improved monitoring will contribute to awareness rising regarding the issue; improve performance within the facility and gathering of credible data which can serve as sound baseline. |
| **4. Occupational safety within hospitals** | Occupational Safety within the hospitals is another issue which is not traditionally considered an environmental issue. Croatia has well developed regulatory and institutional framework dealing with the general occupational safety issue. The regulation dealing with the occupational safety risks specific for the medical facilities has been adopted, including e.g. Ordinance (OG 84/13) transposing 2010/32/EC Directive on Prevention from Sharp Injuries in the Hospital and HealthCare Sector. Finally, staff occupational safety is integrated among the adopted Quality standards (OG 79/11), as well as within the accreditation standards (both adopted OG 31/11 and upgraded version is under the preparation). However, the practice should be improved in all its dimensions, from training and awareness rising, via enforcement, to monitoring and reporting.Technical Assistance to the Agency for Quality and Accreditation in Health Care and Social Welfare in implementation of the full-fledged system as envisioned in the relevant legislation could be considered as candidate measures based on all three (A, B and C) above listed criteria. Improved monitoring will contribute to awareness rising regarding the issue, to improve performance within the facility and to gathering of credible data which can serve as sound base for efficient dealing with the issue.  |
| **5. Inspection tasks under the Sanitary inspection jurisdiction**  | In all of food safety, chemical safety, safety related to biocides and other toxic materials, protection from noise pollution, and from nonionizing radiation, Croatian legislation has been fully harmonized with EU relevant legislation. A low occurrence of accidental events in listed areas indicates effective functioning of the system, including the Sanitary inspection. A lasting challenge remains covering of wide (recently even somewhat increased due to EU membership) scope and variety of tasks and responsibilities with limited number of inspectors which is already below the standard prescribed by the Law (OG 113/08) of 1 inspector per 15000 inhabitants. The priority is to secure sufficient capacity of the Sanitary Inspection for implementation of all requirements of the relevant EU legislation **(potentially candidate measure based on B criteria)**  |
| **6. General area of environmental health**  | MoH is the leading Governmental body responsible for the environmental health (in line with articles 5, 8, 100 of the HealthCare Act OG 150/08 (which is the only legislation covering explicitly area of environmental health), however, jurisdiction is quite fragmented as it has been transferred also to several other ministries (environment, agriculture, water management). The priority measures securing protection of the population from harmful environmental factors with acute consequences (food, water, air, safety) have been effectively implemented. More advanced, long-term systematic monitoring and analysis of health consequences of combined, lower intensity environmental factors exist only within sporadic projects, due to lack of financing and abundance of other more acute problems on the agenda of relevant ministries. Better cooperation of the relevant authorities, as well as better organization of already implemented activities is the priority measure in the area, in order to use significant existing resources in more efficient and effective way. Establishment of the permanent Environmental Health program, as one of the Ministries prevention programs, **could be considered as candidate measure** **based on C criteria.**   |
| **7. Environmental health laboratory services** | These include laboratory services in areas of water, soil and air quality, food safety, common use items safety, safety related to hazardous chemicals, biocides and other toxic materials, protection from noise pollution. Existing system is effective, but inefficient (average number of services provided per employee is much below averages in EU). The main challenge is the system reorganization, modernization and rationalization in the context of shared authority over the system (between the national and regional levels of government). Reorganization of the system that would result with higher efficiency **could be considered as candidate measure based on C criteria**. |
| **THEMES RELATED TO RESOURCE-EFFICIENCY OF THE HEALTHCARE SYSTEM** |
| **8. Energy efficiency** | The HealthCare Strategy 2012-2020 actually foresees and stipulates energy efficiency activities as part of the foreseen functional reconstructions of medical facility, within the Priority 4 – health facility network restructuring and reorganization.Recent EE related UNDP project House in Order identified a lot of space for improvement and helped established the framework, and initiated processes (pipeline of prepared projects in different phases of preparedness). The Operational Program for use of EU funds puts strong emphasis on EE projects which can be co-financed from EU structural funds. These projects also contribute to fulfillment of the national targets in EE, set by National Program for EE 2008-2016 and associated National Action Plans (2nd for period until the end of 2013, and 3rd for 2014-2016), all in line with 2006/32/EC energy efficiency directive and EU EE goal ofreducing consumption of primary energy by 20**%** by 2020. Preparation of EE projects – both within context of the planed reorganization / rationalization of health facility network and for the pipeline of projects for EU funds – **could be considered for inclusion in the Program (based on A and C criteria)**  |
| **9. Green building design measures** | All new reconstruction works within the context of planned reorganization should be verified for integration of green building design measures, in line with some of the existing best practice guides / certification schemes (e.g. Green Guide for HealthCare). Some smaller reconstruction or cultivation (landscaping, green roofs) for more environmentally sound design of facilities could be included into EE projects prepared for EU co-financing. **A candidate measur**e **based on A and C criteria.** |
| **10. Alternative energy sources** | A lot of potential for using renewable energy sources (RES) – primarily for heat generation and pumping and heating water: solar panels in coastal areas with higher insulation; biomass boilers in continental parts with lot of biomass from agriculture and forestry. These are also types of projects that can be co-financed from EU structural funds. These projects also contribute to fulfillment of the national targets in RES (as set by National Action plan for RES (2013-2020). A candidate measure **based on A and C criteria.** |
| **11. Water conservation** | A lot of space for improvement by introduction of some inexpensive fixtures, staff training and water use monitoring. Measures can be integrated during the project design as well as through promoting EE efficiency, as projects dealing with improvement in overall environmental performance of the medical facilities. A candidate measure **based on A and C criteria.** |
| **12. Green public procurement** | As a major consumer on the market, by adoption of the green procurement practices – i.e. procurement that considers environmental friendliness as a criteria in selection of goods and services, and takes into account not only the purchase cost, but estimate of the sum of purchase, use and disposal costs – HealthCare sector can help environment by both improving its’ environmental performance, and by contributing to strengthening of the national and local markets of green products and services. This fact is also recognized by the NHCS 2012-2020, which stipulates adoption of the green procurement practice in the Croatian HealthCare system operation. Initiation of Green Public Procurement (GPP) practices, in the context of foreseen Program’s activities addressing public procurement system (primarily its centralization) could be considered as candidate measures **based on A and C criteria.**  |
| **13. Food related measures** | Highest possible quality food is important part of the HealthCare service quality. HealthCare facilities are one of the major food buyers/consumers. Introduction of more seasonal, fresh, non-processed, preferably organically and locally produced food on the hospital menus contributes both to the quality of HealthCare and benefits of the patients; creation of national organic food market; and environment. It requires only decision, staff training, promotional campaign and established green procurement of food.A candidate measure **based on C criteria (**it could be one of the primary focuses of the Green public procurement within the HealthCare system).  |

As it would be unrealistic to expect inclusion of all the candidate measures into the Program, and as the detailed elaboration of all the candidate measures identified in the Table 5 is far beyond the scope of the ESSA, the focus of the Environmental Systems Assessment – after the initial screening phases – has be narrowed down on a group of themes that were assessed as the highest priority themes. These include:

1. Medical waste management;
2. Radiological safety within the medical facilities and radioactive waste;
3. Hospital infections;
4. Occupational health within hospitals;
5. Energy efficiency;
6. The areas under the jurisdiction of the Sanitary inspection, including: chemicals and biocides safety, environmental noise protection and protection from nonionizing radiation
7. Environmental Health & EH Laboratory Services

Only these themes – i.e. their problem context and relevant management systems – were further analyzed and elaborated in the following chapters. Nevertheless, the final recommendations kept on mind the wider picture that includes all the candidate measures identified within the Screening phase of the assessment.

### SOCIAL IMPACTS SCREENING

The Program associated potential social impacts identified through the screening exercise can be structured around the four main themes.

**THE FIRST ONE** is related to the challenges of the significant organizational changes and likely internal and external resistances to these changes. Namely, the Program foresees system changes and upgrades in both the system’s organization (primarily reorganization of the health facility network aiming for higher efficiency and quality of services for patients) and the ways in which the health care services are provided (e.g. quality monitoring and control, defined care path protocols and procedures, centralized procurement). Therefore, the main aim of these changes is higher overall quality for the patients and better organized and managed system for the employees. Although all these changes are overall in favor of both, patients and the employees within the system, they always have opposition, as overall improvements often come at the cost of some objective local loses. Negative perception and reactions could pose a major risk. Also rightsizing/rationalizing of the hospital capacity or health facility network and the health facility network foreseen in the Program could be perceived by interested public as reduction of their rights in the sense of decreased accessibility of health services in the region (county) where rationalization will happen.

**THE SECOND GROUP** of potential social impacts are related to social inclusion and equity in access to the health care services.***The Social Protection and Social Inclusion in Croatia Final Report for The European Commission (2006)*** reported that Significant inequalities on the basis of socio-economic status exist in Croatia with studies showing that low income groups use significantly less specialist services than higher income groups when health status is held constant. Equity issues are also raised by the growth in out of pocket payments which are disproportionately paid by lower income groups. In addition, privatization of some services has introduced a two tier system. Main groups at risk in terms of low access to quality health services are: those on a low income, the unemployed, large families, the elderly and people living in remote areas (including coastal areas and islands).

***National Health Care Strategy 2012-2020*** is addressing the issues of some vulnerable groups and their problems: *“the greatest contribution to the disease burden of the* ***elderly people*** *is chronic diseases. The most common diseases in elderly people are hypertension, intervertebral disc disease and other dorsopathy, heart disease, acute infections of upper respiratory systems, and diabetes. Share of hospitalized people at the age of 65 and over amounts to 30% of the total number of people treated at hospitals in Croatia. Also there are more than 519,000* ***persons with disability*** *in Croatia, which is about 12% of the total population. The most common conditions causing disability are impairments of the locomotor system, mental disorders, impairments of other organs and body systems and impairments of central nervous system. Available data on health of* ***Croatian war veterans*** *show that the most common causes of hospitalization in the impatient wards at hospitals, according to groups of diseases of the veterans and their family members, were mental disorders (76.6%). There is a total of 61,594 Croatian war veterans from the Homeland War, obtaining their status based on wounding, injuries or diseases. There are no routine health care and statistical research on the condition and health care of* ***Roma****; therefore the estimates are given based on individual field research. Data on infant mortality in Roma, though incomplete, show great differences when compared to non-Roma population, and the mortality rate in Roma is 3-4 times higher than in the non-Roma population.”*

Any reform or activity designed to change conditions for listed groups or selected problems could have negative impact and be recognized as negative. However, the main goal of the Strategy and the Program is to change existing inequalities and inequities in health. Program activities, primarily planned rationalization of the health facility network, are designed to create new resource allocation in health care. These changes will not increases but decrease regional disparities in accessibility of health services for targeted groups (certain professionals, diagnostic procedures, therapies, etc. Also, it is not expected for these changes to deepen the existing inequalities in health status outcomes between different income levels groups (large gaps between the richest and the poorest groups).

**THE THIRD** are issues related to social accountability of the health care system, both in implementation of the foreseen reforms and in the functioning of the reformed system. Further improvements in transparency at the high-level decision making in the health care system are needed, though some initiatives to that effect are already underway. For example, the new Regulation introduced in 2009 has improved transparency, timeliness and methodology of decision making by the CHIF’s Committee for Medicines. Since 2010, patients’ representatives are members of county health councils. Since 2012, some positive changes have been implemented: participatory approach has been applied in the preparation and development of the National Health Strategy 2012-2020 with a series of consultations meetings and public debates held country wide. Also some potential negative impacts of the Program could be communicated, discussed or mitigated during regular weekly meetings that are being held between various patients’ associations and Minister of Health. Additionally, the website of the Ministry of Health is a good example of transparency with all relevant health information posted and communicated to the public.

**THE FORTH GROUP** of potential social impacts of the Program supported reforms could relate to the impact on the employees – medical and non-medical staff within the reformed system. These primarily relate to the long term plans for outsourcing of non-medical services and impacts caused by reorganization of the health facility network Human resources planning is limited despite Croatia’s facing problems with medical professionals, such as shortage of medical doctors and oversupply of some other types of health professionals. In recognition of the unfavorable human resources trends, the National Health Strategy 2012-2020, stresses the need for strategic planning in the area of human resources. In 2013, a consulting team was contracted by the Ministry of Health to prepare a Strategic Plan for Human Resources Development in Health Care. The work is scheduled to be completed by the end of 2013. The Program activities could further increase regional disparities in job opportunity within the sector between rural and urban areas and different Croatian regions. Program activities, primarily planned rationalization of the health facility network and health services could have negative social effects in terms of potential new professional roles for medical staff. As one of the measures of the Program could be non-medical services outsourcing (e.g. laundry, cleaning services…). These measures could have negative social effects in terms of potential retrenchment /lay-offs of non-medical staff working in non-medical services such as laundry, cleaning.

.

## Brief consideration of the borrower’s more recent experience relevant for the Program

### Recent relevant experience related to the Environmental aspects of the Program

All of the listed key implementing agencies have been involved in a number of projects whose main goal was to build their capacities and prepare them for implementation of the *Acquis communautaire*. Successful completion of the EU accession, i.e. closure of the relevant negotiation chapter, indicates that capacities have been assessed as sufficient for the task.

The most relevant projects include:

MEDICAL WASTE MANAGEMENT, EMISSIONS TO AIR AND WASTE WATER

* Couple of thematic supervision of all public major medical facilities in Croatia by Croatian Environmental Protection Inspection in 2008, 2009, 2010 related to the issue of medical waste management, i.e. to the implementation of a year earlier adopted Ordinance on medical waste management (Official gazette 72/07) (the reference is based on existing official Environmental inspection reports for 2008, 2009 and 2010. The reports for 2011 and 2012 are not publicly available, however – based on remark in the report for 2010, which confirms positive trends, but also concludes that regular inspections are necessary, because there are still irregularities, and inspection audit had proven as efficient method for their correction – thematic supervision most probably continued also in 2011 and 2012);

RADIOLOGICAL SAFETY

* Ongoing IPA 2008 project “Health Protection in Relation to Medical Exposure” implemented by State Office for Radiological and Nuclear Safety in partnership with 12 hospitals (including 4 out of 5 clinical hospital centers)
* Ongoing comprehensive supervision of nuclear medicine departments in Croatian hospitals implemented by State Office for Radiological and Nuclear Safety with objective to assess the current practices and equipment related to the radiological safety and identify critical weaknesses and needs.
* IPA 2011 project “Upgrading of the systems for on- and off-line monitoring of radioactivity into the environment in Croatia”

ENERGY EFFICIENCY

* House in order project, implemented since 2009 by UNDP, addressing in very systematic and comprehensive way potential for improvement of Energy efficiency in all public sector buildings (including those in the HealthCare sector);

SANITARY INSPECTION

* CARDS 2002 Strengthening Sanitary Inspection (completed in 2006),
* PHARE 2006 - Developing capacity in implementation and enforcement of environmental law through ECENA and IMPEL project (ongoing up to November 2009);
* IPA 2007 “Chemical Safety – Strengthening Legal Framework of Institutional Infrastructure for protection from Dangerous Chemicals” (September 2010- September 2012);
* Ongoing (2012 – 2014) IPA ECHA project dealing with establishment of “help-desk” which is stipulated as obligation of the responsible authority by REACH and CLP Regulations
* IPA 2009 TA for preparation of the National strategy on Environmental Noise Protection (draft Strategy prepared as the result of the project)

ENVIRONMENTAL HEALTH & EH LABORATORY SERVICES

* IPA 2010 project that resulted among other with the Draft proposal of the Strategy for upgrading the environmental health laboratory services for official control and monitoring in Croatia according to the Acquis requirements;

### Recent relevant experience related to the Social aspects of the Program.

The key objectives of the health system for the period after 2013 can be found in the National Health Development Strategy 2012-2020 (Box 1.).

**Box 1. Objectives, goals of the National Health Development Strategy 2012-2020**

|  |
| --- |
| **Strategic objectives:**1. Prolong life expectancy;
2. Improve quality of life; and
3. Reduce differences in health and HealthCare.

**Strategic goals:**1. Improvement of connectivity and continuity in HealthCare;
2. Equalization and improvement of HealthCare;
3. Improving efficiency and effectiveness of the HealthCare system;
4. Increasing availability of HealthCare; and
5. Improving health indicators.
 |

The following reform initiatives have been taken with the aim of achieving the objectives stated in the National Health Development Strategy 2012-2020. (Box 2.)

**Box 2. Initiatives related to National Health Development Strategy 2012-2020 priorities**

|  |
| --- |
| **Priorities/Initiatives**1. **Informatization of HealthCare and development of e-health**

**-** Integration of the e-registries in HealthCare, e-record, e-waiting lists,1. **Strengthening of human resources in HealthCare and their better use**

-Strategy on workforce in HealthCare1. **Strengthening of management capacities in HealthCare**

-Business process improvement in Croatian Health Insurance Fund1. **Reorganization of the structure and activities of HealthCare institutions**

- the internal organization/structure changes of the hospitals, hospital emergency medicine service development1. **Encouraging quality in HealthCare**

-Hospital accreditation project1. **Strengthening preventive activities**

-National screening programs1. **Preserving financial stability of HealthCare system**

-financial consolidation in hospital HealthCare1. **Inter-sectorial cooperation**

-Strategy for palliative care in Croatia |

# Description of Applicable Management Systems

## Relevant Environmental Management Systems

### Management systems relevant for the Program’s potential impacts

#### Construction works

Foreseen construction works includes exclusively reconstruction of existing premises, or some minor appendices/ modifications to the existing premises improving theirs overall functionality. These types of construction works do not require Environmental Impact Assessment, according to the Environmental Protection Act (OG 117/09).

Environmental aspects commonly associated with these types of small scale construction works are: noise and vibrations; soil erosion due to wind and water run offs, emissions of dust and equipment and vehicle exhaust, accumulation of construction, municipal and hazardous waste, accidental spills, and other occupational, safety and environmental aspects like pedestrian safety, organization of the construction site, traffic management, protective equipment, etc.

All mentioned related environmental aspects are regulated in two ways. First one is through the permitting system for construction itself where different authorized bodies issue permits or conditions for constructions (awarding of Location, Construction and Operational permits; sectorial regulations such as water rights permits, police requirements for traffic safety, etc.) in which they stipulate environment related construction practices specific for the site. The second one is through sector specific regulation like national standards for emissions and other impacts. For example, all vehicles and equipment needs to be attested, the workers need to have training on safety, the construction companies need to have contracts with licensed companies / landfills for waste disposal. All of these regulations have been harmonized with relevant EU legislation.

During the construction, the site engineer and supervising engineer are present on site. Former is in charge of compliance with the permits and regulation and later for the supervision of the compliance. Any deviation is recorded in the construction diary which is inspected by construction inspection. The construction company is also keeping records of practices regarding different sectors, like waste manifests and contracts with waste management companies for waste management. The construction company would also hold special permits for more specific types of work. For example, if working on building of cultural importance the company would need to be licensed by the Ministry of Culture.

#### Systematic management, monitoring and accreditation of the quality (including environmental performance) within the HealthCare sector

The Croatian legislation related to the HealthCare sector quality include the Act on the Quality of the HealthCare and Social Care (OG 124/11) and associate bylaws like Ordinance on HealthCare Quality Standards and its Implementation (OG 79/11); Ordinance on the Accreditation Standards for Hospitals (OG 31/11). In addition to these, the MoH adopted Plan and Program of Measures for Securing, Improvement, Promotion and Monitoring of the Quality in the HealthCare System (OG 114/10). **The full compliance with the defined quality standards is mandatory, while the accreditation is voluntary.** The Ordinance on the Accreditation Standards is currently being updated to align with the accreditation standards development defined by the ISQ – The International Society for Quality in HealthCare).

The main institution in charge of establishment, coordination and management of the quality monitoring, control and accreditation framework is The Agency for Quality and Accreditation in Health Care and Social Welfare. Each medical facility is responsible for establishment and management of its quality management systems. The agency’s task includes support to HealthCare providers in their efforts on implementation of a system of HealthCare quality assurance and improvement.

Both quality and accreditation standards have integrated standards specifying environmental quality of the facility; however, not all the standard environmental themes relevant for the health sector have been covered.

### Management systems relevant for other identified HealthCare sector environmental priorities

#### Medical waste management

The authority responsible for the overall area of waste management in Croatia is Ministry of Environmental and Nature Protection. Croatian legislation related to the waste management in general, and medical waste management in particular is fully harmonized with EU legislation. The relevant legislation include: Sustainable Waste Management Act (OG 94/13), and number of bylaws, primarily Ordinance on Medical Waste Management (OG 72/07), while some obligations are specified also by Ordinance on Waste Management (OG 23/07, 111/07), Ordinance on Register of Environmental Polluters (OG 35/08), and The Waste Catalogue (OG 50/05, 39/09). Relevant strategies and plans include: National Waste Management Strategy (OG 130/05) and National Waste Management Plan for period 2007-2015 (OG 85/07, 126/10, 31/11).

The larger producers of medical waste (>200kg of hazardous medical waste annual) should designate a responsible person within the company / institution, while for the small producers (< 200kg/year) the responsible person is general manager. The producers are responsible for selective collection of medical waste, record keeping, disposal into suitable containers and temporary storing in appropriate storage space, until it is handed over to the company authorized by the MoENP for medical waste collection, processing and disposal.

Environmental Inspection has supervision authority, over the all mentioned instances within the system.

#### Radiological safety within the medical facilities and radioactive waste

Croatian legislation related to the Radiological safety within the medical facilities and radioactive waste has been fully harmonized with EU legislation. The legislation include: Radiological and Nuclear Safety Act (OG 28/10) and number of bylaws including primarily Ordinance on Conditions for Use of Sources of Ionizing Radiation in Medicine and Dental Medicine (OG 89/13); but also Ordinance on Approvals and Permits for Operation and Trading of Sources of Ionizing Radiation (OG 71/12, 89/13); Ordinances on Preconditions and Protection Measures Related to Operation of Sources of Ionizing Radiation (OG 41/13) and related to Operation of Electrical Devices that Generates Ionizing Radiation (OG 41/13); Ordinance on Measuring of the Received Radiation Doses, Investigation of the Sources of Ionizing Radiation, Conditions for Operation and Mandatory Reports (OG 41/12, 89/13); Regulation on Management of Radioactive Waste, Used Sealed Radioactive Sources, and Sources of Ionizing Radiation that are not Anymore Used (OG 44/08); Ordinance on Monitoring of Radioactivity in Environment (OG 121/13); Ordinance on Limiting Values of Received Ionizing Radiation (OG 59/13); Ordinance on Education Required for Handling of Sources of Ionizing Radiation and Application of Relevant Protection Measures (OG 63/11); Ordinance of Physical Securing of Radioactive Sources, Nuclear Materials and Objects (OG 38/12).

The responsible authority for the area of Radiological safety within the medical facilities and radioactive waste is State Office for Radiological and Nuclear Safety (Croatian acronym is DZRNS). Its’ tasks include: issuing permits for operation with sources of ionizing radiation; participation in issuing of location permit for premises for sources of ionizing radiation; control of ionizing radiation in environment, food, etc.; keeping of official registers related to sources of ionizing radiation, its operation, legal and physical persons involved, etc.; inspection tasks related to the radiological and nuclear safety; preparation of educational plans and programs; informing on accidents with sources of ionizing radiation.

#### Hospital infections

The main legislation regulating area of hospital infections, which fully implement all WHO and ECDC (European Center for Disease Prevention and Control) standards and recommendations, include Act on Population Protection from Infectious Diseases (OG 79/07, 113/08, 43/09) and Ordinance on Preconditions for and Implementation of Measures for Prevention and Abatement of the Hospital Infection (OG 85/12, 129/13). In addition to that, various official Guidance documents have been issued by various groups including Guidelines for Prevention, Control and Treating of Methicillin-resistant *Staphylococcus aureus* (MRSA); and Guidelines for Hand Hygiene in Medical Facilities.

Ordinance specifies 21 measures for prevention and abatement of the hospital infections which includes all standard measures recommended by WHO, including among others hygiene practices and procedures for patients, staff and visitors; cleaning, disinfection and sterilization of the premises and equipment; food and water hygiene; securing of required air quality within the facility; proper management of infectious waste; securing hygienic-technical appropriateness of the premises.

Ordinance also defines the main tasks and responsibilities, including responsibility of the Committee for Hospital Infections of the MoH, Committees for prevention and abatement of hospital infections within each medical facility and Teams for control of hospital infections. The main tasks of the Committees in medical facilities include preparation and adoption of the Program for prevention and abatement of the hospital infection, as well as monitoring and supervision over its implementation and reporting to the National Level Committee. National Level Committee monitors and evaluates situation, issues Guidance documents, provide support to the Committees of particular medical facility, issues annual report hospital infections in Croatia.

The Teams for Control of the Hospital Infections within each medical facility are responsible for monitoring, controlling, supervision, coordination and facilitation of implementation of standard hospital infections measures within the facility. The team consists of 2 or 3 members, including medical doctor specialist for microbiology and nurse / medical technician with required competences in issues of hospital infections prevention and abatement. Ordinance specifies minimal required staff standards, which is 1 full time employed, fully dedicated microbiology specialist in facilities with over 1000 beds, and one fully dedicated nurse / medical technician per 250 beds.

Subject of hospital infections is also covered by adopted Quality standards (OG 79/11) and Accreditation standards (OG 31/11) for hospitals.

#### Occupational safety within the hospitals

Croatia has well developed regulatory and institutional framework dealing with the general occupational safety issue, including the Act on Occupational Safety (OG 59/96, 94/96, 114/03, 100/04, 86/08, 116/08, 75/09, 143/12) and numerous other Laws and bylaws regulating specific aspects of the occupational safety. The regulation dealing with the occupational safety risks specific for the medical facilities has been also adopted, including e.g. recently adopted Ordinance (OG 84/13), which transposes 2010/32/EC Directive on Prevention from Sharp Injuries in the Hospital and HealthCare sector, and above mentioned Ordinance on Prevention and Abatement of the Hospital Infections.

Staff occupational safety is also integrated among the adopted Quality standards (OG 79/11), as well as within the accreditation standards, currently being revised.

Ministry of Labor is authority responsible for establishment of the functional regulative framework. All employers, which clearly include all medical facilities, are responsible for its implementation, i.e. for securing of the safe working environment.

#### Energy efficiency in HealthCare sector

Croatia fully transposed EU directive 2006/32 on energy end-use efficiency and energy services by its End use energy efficiency Act (OG 152/08, 55/12). Besides, in line with the directive / Act’s requirements, Croatia also adopted National energy efficiency program 2008-2016, as well as the First (for period 2008-2010) and Second (for period 2010-2013) Energy efficiency national action plan. The targets set in the Program and Plans are in line with EU target of 20% reduction in used primary energy by 2020. In line with the directive’s requirements (article 14), each Action plan review advance in fulfillment of the set targets, and if necessary, adopts additional measures in order to secure achievement of the targets in 2016 (and later on 2020). The Action plans are submitted, reviewed and cleared by European Commission, which is in charge of fulfillment of the overall EU 2020 target.

The Second Action Plan specifies that the major focus should be on preparation and implementation of the EE projects in buildings. Namely, the assessment is that potential for reduction in buildings makes over 50% of the planned total reduction until 2016. In doing this, public sector is expected to lead as an example, as was the case in several EE projects that various partners from public sector have been implementing in recent period, in cooperation with UNDP and EPEE Fund.

The national competent authority for the area of energy efficiency is Ministry of Economy. Ministry of Construction and Physical Planning plays important role in area of EE measures in building. Important role in co-financing of the EE projects has Environmental Protection and Energy Efficiency Fund. Croatian Real-Estate Agency is designated as the agency which will take over the role of the main coordinator of the EE initiatives in Croatia, especially related to the EE in buildings owned and/or governed by the public sector (i.e. continuation of the House in order project that was implemented by UNDP and all Ministries). The foreseen EE projects in public sector will be financed through ESCO models developed by EPEE Fund, Croatian bank for Reconstruction and Development and interested commercial banks. The EU structural funds will be also used for financing.

#### The areas under the jurisdiction of the sanitary inspection, including: chemicals and biocides safety, environmental noise protection and protection from nonionizing radiation

The legislative framework regulating work of the Sanitary inspection consists of 164 laws and By-laws, including general legislation on Sanitary inspection (Sanitary Inspection Act (OG 113/08, 88/10) and 5 By-laws); Chemicals (19); Biocides (5); Environmental Noise (7); Smoking-reduction/prevention (3); Asbestos (3); Common Use Items (11); Ionizing radiation (29); Nonionizing radiation (5); Protection of population against infectious diseases (19); Food safety (45); Drinking water quality (2); GMO and novel food (10). These numbers alone indicate complexity of the Inspection’s task in securing public health interest. More specifically, the main pieces of legislation in the subset of the above listed areas which are standardly categorized as part of the environmental sector - as indicated by e.g. their inclusion into official State of the Environment Reports, or among the subjects under jurisdiction of the EC DG Environment – include:

* in area of Chemical Safety: Chemicals Act (OG 18/13); Biocides Act (OG 63/07, 35/08, 56/10); Acts on implementation of the relevant EU Regulation, including 1272/2008 CLP Regulation on Classification, Labeling and Packaging of substances and mixtures (OG 50/12, 18/13); 1907/2006 REACH Regulation on Registration, Evaluation, Authorization and restriction of Chemicals (OG 53/08, 18/13); and 689/2008 PIC Regulation On Prior Informed Consent On Import And Export Of Chemicals (OG 139/10, 25/13); as well as a number of By-Laws Including Ordinance On Requirements For Legal Persons Authorized For Production, Trade And Use Of Chemicals (OG 99/13); on Good Laboratory Practice (GLP) (OG 38/08) (and associated National program for supervision of compliance with the Good Laboratory Practice (OG 61/12)); On Education And Certification For Work With Chemicals (OG 99/13). There is also National strategy for chemical safety (OG 143/08) prepared in 2008[[8]](#footnote-8). A short transition periods was negotiated for application of REACH and CLP directives for Croatian legal persons producing, trading and using chemicals: one month for registering at ECHA in line with CLP directive; six months for preregistration of chemicals at ECHA for amounts above 1 t/year and twelve months for registration of chemicals at ECHA for amounts above 100t/year, starting from the 1st of July 2013, when Croatia became EU member).
* In area of Protection from Environmental Noise: Noise protection Act (OG 30/09, 55/13) which fully transposed relevant EU Environmental Noise Directive 2002/49. Same as the Directive, Act requires preparation of the strategic noise maps for areas most exposed to the environmental noise (larger towns with over 100.000 inhabitants, owners and/or concessioners of the major industrial sites, roads, railroads and airports. The map assesses both the levels of environmental noise in the area and number of affected inhabitants. The Act also requires preparation of the action plans with measures to reduce noise in overly exposed areas and prevent worsening of situation by introduction of the new noise sources. The Directive does not set any limit value, however, Croatian legislation includes bylaw on the upper border allowed environmental noise levels in areas where people live and work (OG 145/04, 46/08).
* in area of Protection from Nonionizing Radiation: Nonionizing Radiation Protection Act (OG 91/10); Ordinance on Protection from EM fields (OG 98/11);

The Directorate for Sanitary Inspection within the MoH, i.e. its departments dedicated to particular areas, is the responsible authority for almost all above listed areas. The exceptions are food safety, in which Ministry of Agriculture has a lead, and Protection of Ionizing radiation, where State Office for Radiological and Nuclear Safety has a lead.

The other institutions with important roles in the listed areas include:

* Croatian National Public Health Institute and network of county Public Health Institutes are providing required laboratory services.
* Croatian Institute for Toxicology and Antidoping is the main operative provider of information, advice, education program, certificates on fulfilled education programs in area of chemicals. It provides mandatory education programs for person in charge of chemicals, education in preparation of SDS (Safety Data Sheet) for chemicals, helpdesk on REACH, CLP, CIP requirements. It is also in charge of the central database on chemicals produced, imported/exported, used in Croatia, which collects mandatory data from all legal person dealing with chemicals in Croatia.
* Various legal entities officially authorized by Ministry for official monitoring and analysis

#### Environmental Health & EH Laboratory Services

The main law regulating the area of Environmental Health or Health ecology is the Health Protection Act (OG 150/08), which in lists all standard activities of the health ecology namely: “measures in area of health protection against harmful factors in environment”, including food, water safety, water and air quality, noise protection, protection from chemicals, ionizing and nonionizing radiation. According to the same Act the government (national and regional) is responsibility to finance environmental health measures. The topics of Health ecology fall under responsibility of the Public Health Institutes (PHI).

Currently, there are 22 PHI’s in Croatia: the Croatian Public Health Institute as the central one on the national level; PHI Andrija Štampar in the capital Zagreb, and 20 County PHIs. All of them, with the exception of two, established EH Services as departments specialized for EH tasks and activities.

Beside Public Health Institutes, i.e. their departments/services for Health ecology, important role in the area of Health Ecology have also Croatian Institute for Toxicology and Antidoping, State Office for Radiological and Nuclear Safety, Institute for Medical Research and Occupational Health, as well as number of Ministries that have lead role in protection of particular environmental components (including Ministry of Environment protection for air and waste and Ministry of Agriculture for water, food, soil).

The Health ecology services within the Public Health Institutes have their EH Laboratories.

Croatian Accreditation Agency is authority for accreditation of EL Laboratories according the international norm ISO 17025.

As part of the EU acquis harmonization, Croatia also adopted Ordinance on Good Laboratory Practice (OG 38/08) and National Program of Surveillance of Compliance with GLP (OG 61/12) which transposed EU Directives 2004/9/EC and 2004/10/EC. The MoH is in competent authority for implementation of both Ordinances.

## Relevant Social Management Systems

### Task force in charge of the reforms

The MoH is responsible for HealthCare planning at the central level and is key stakeholder in charge of the reforms. Thus MoH is responsible for any social issues or consequences related to health or HealthCare system reform. [[9]](#footnote-9)

The MoH for many years operates various HealthCare reform projects, mainly governed by task force or working groups. These experiences of task forces and various set of planning/governing procedures or tools enables Ministry to develop and implement new project or programs - as the PforR.

The long-term planning tool of the Ministry is the National Health Strategy. The last Strategy was published at the end of 2012 and is the third document of this sort in the last 15 years. Its planning period (2012-2020) coincides with key strategic documents of the EU and WHO, such as *Health 2020*. The Strategy is the umbrella document determining the context, vision, priorities, goals and key measures in HealthCare in the planning period. Based on this umbrella document, other planning documents are developed.

The National Health Plan (NHP) is the medium-term planning tool. The latest Plan was published in mid-2012 and contains objectives for the next three years. It contains broad tasks and goals of the HealthCare sector, priority areas and health needs of population groups of special interest. It also sets out actors responsible for its implementation, deadlines and benchmarking criteria. As health needs assessment is not well developed, these objectives are based on basic health monitoring and are defined in function of the existing HealthCare structures. The CNIPH monitors the health needs and proposes objectives for the NHP to the MoH.

Based on the NHP the MoH prepares a Plan and Program of Health Care Measures, with a catalogue of HealthCare goods and services that must be delivered to the Croatian population (e.g. measures and activities in the area of prevention, early detection and control of infectious and chronic diseases) aimed at achieving the objectives of the NHP. The latest Plan and Program of Health Care Measures was published in 2006 and a new one is being prepared in 2013. The Plan is based on the suggestions of the CNIPH and the opinions of the competent chambers.

The CHIF uses the NHP and the Plan and Program of Health Care Measures to prepare its annual plans for the provision of HealthCare services. Based on these annual plans, it passes regulations on health insurance entitlements and signs contracts with HealthCare providers. Providers contracted by the CHIF operate within the National Health Care Network. The Network existed from earlier times, it was formally introduced in 1993 according the new legislation in 1993 and is an official planning tool that determines allocation of HealthCare resources between regions (the goal is to ensure equality of access to care for all citizens) according to morbidity, mortality, traffic links and demographic characteristics of their respective populations and is adopted by the Minister of Health.

At the level of counties and the city of Zagreb, County Public Health Institutes collect health statistics and participate in the formulation and implementation of county health programs for their respective areas. These programs were introduced by the “Healthy Counties” project. They represent local health priorities but also have to be compatible with the NHP.

### Current practices, legal and institutional framework securing equity in access to HealthCare services

There are several other acts which regulate the work of the health care professionals and health services. The Health Care Act regulates the principles of health care organization, the rights and obligations of health care users, types and responsibilities of health care institutions (at various levels of care) and establishes the principles of monitoring of health care institutions. The Law on Compulsory Health Insurance regulates the scope of the right to health care and other rights and obligations of persons insured under the MHI scheme, supervision, financing, organization, and tasks of the CHIF and the conclusion of contracts between the CHIF and health care providers and suppliers of medical goods. The rights of patients are comprehensively regulated in the Patient’s Rights Protection Act.

The National Health Care Network is the official planning tool that determines allocation of health care resources (financial and other, such as infrastructure and human resources) between counties. The allocation of resources takes into account parameters such as morbidity, mortality, traffic links and demographic characteristics of their respective populations and it is renewed every two to five years.

Croatia’s social health insurance system is based on the principles of solidarity and reciprocity, with the citizens expected to contribute according to their ability to pay and receiving basic health care services according to their needs. There is one insurer in the mandatory health insurance (MHI) system, the Croatian Health Insurance Fund (CHIF).

Health is influenced by policy decisions in a wide range of sectors. The importance of inter-sectorial cooperation in the area of health is emphasized in the National Health Strategy 2012-2020, which includes „cooperation with other sectors and the society in general as one of its priorities. Following the European strategy *Health 2020*, the National Health Strategy advocates the „health in all policies“ approach, „whole-of-government“ approach and „whole-of-society“ approach and enumerates examples of the existing and possible forms of cooperation which should be strengthened and coordinated. Health is taken into account in both the decision making process and policy implementation. In any regular decision making process at the central level, inter-sectorial cooperation between the Ministries, including the Ministry of Health, must be assured. The need for inter-sectorial cooperation in the implementation of legal acts is often explicitly stated in the legal act themselves. Inter-sectorial cooperation between various actors (such as Ministries, agencies, institutes, schools, NGOs, civil society organizations, media, etc.) is also taken into account [in the implementation of a number of national strategies and programs, for example, the National Strategy of Protection Against Family Violence (2011-2016), the National Program for Occupational Health and Safety 2009-2013, the National Mental Health Strategy 2011-2016, the National Strategy against Disorders caused by Excessive Consumption of Alcohol 2011-2016, and the National Strategy and Action Plan against Narcotic Drug Abuse, and initiatives at the county level, such as the “Healthy counties” project.

### Current practices, legal and institutional framework securing social accountability of the Croatian HealthCare service

#### Participatory Approach Applied

Drafting the Strategy 2012-2020 was based on a partnership approach, and was organized in such a manner to include as wide as possible a circle of interested experts and general public. The expert and public consultations (including workshops with committees) were organized with aim to collect and process the results of such consultations, and prepare the draft of the Strategy and its final version. The committees consisted of experts from various institutions, societies and organizations in the HealthCare system. Through the workshops and by consulting with the Coordination Board, the committees helped identifying the priority problems in HealthCare and the possibilities of influencing the problems, and they were organized in such a manner that each of them observed the entire HealthCare system, but from different perspectives. That was the attempt to achieve a holistic approach to thinking about the problems and strategic planning in the HealthCare system.

#### Patients’ Associations and Patients’ Rights

 The first association for patients’ rights in Croatia, the Croatian Association for Patients’ Rights, was founded in 1999 and since then a large number of other NGOs included the issue of protection of patients’ rights in their programs. They actively participate in the decision making process by participating in public debates, but their formal influence is limited. In addition, patients are represented in the *County Commissions for the Protection of Patients’ Rights*[[10]](#footnote-10) Patients’ representatives are also members of the governing board of the CHIF and of the *county health councils[[11]](#footnote-11)*. In order to enhance public participation and improve patients' satisfaction, in 2012 Minister of Health introduced regular meetings with patients associations' representatives. As of January 2012, representatives of different associations meet once a week with the Minister and discuss patients' problems and obstacles encountered while realizing their right to HealthCare.

#### Capacity Building

Process of change caused by decentralization was seen as an excellent opportunity for improving Public Health practices in Croatia at the County level. A »learning-by-doing« training approach appeared to be the best tool for public health capacity building and strengthening of collaboration between health policy stakeholders at the county level in order to both build knowledge and skills. Based on Healthy Plan-it™ program (developed by Centers for Disease Control and Prevention, USA) for identifying and prioritizing healthcare needs and developing plans for addressing them, and other materials, the faculty members tailored a public health capacity building »Health – Plan for it« program proposal for Croatia. The program’s aim was to provide guidance and assistance to counties, while introducing more effective and efficient public health policies and practice. By the end of 2010 all counties and city of Zagreb joined to the program and developed their own public health priority programs based on this “bottom-up” program.

#### Grievance Mechanism

A patient who considers that one of his/her rights established by the 2004 Act has been violated may make a verbal or written complaint to the head of the health care institution in which the alleged violation took place. If the head of the health facility does not inform the patient within eight days of measures that have been taken relating to his/her complaint, or if he/she is not satisfied with the measures taken, the patient has the right to submit a complaint to the competent County Commission. This Commission is obliged to inform the patient, within a maximum of 15 days, of all measures taken in relation to his/her complaint. The County Commission has the right of access to health care facilities and examine if the rights of patients are observed. The Commission is obliged to write a report on the inspection it undertakes and must send it to the competent inspector (health or sanitary), within no more than 8 days, or to the body responsible for inspection of the work of health workers, that is the bodies of individual professional chambers. These bodies are obliged to report to the Commission within 30 days of receiving the report, and in urgent cases without delay, on the measures undertaken. If the competent body (inspectors or a chamber) has reason to suspect that a petty or criminal offence has been committed, it is obliged to submit a petty offence or criminal complaint within 30 days from the completion of the inspection and inform the Commission of the outcome of the procedure. The latter has 8 days to inform the patient

Patients who are not satisfied with the measures taken to protect their rights, can seek their rights from a relevant professional chamber, the Minister of Health (via e-mail or on the phone), or a competent court, which may award financial compensation (the burden of proof lies on the side of the patient). Also the Ministry of Health introduced a free telephone service „White Phone“ which enables patients to report their complaints on health workers or any other complaint in relation to realizing their right to health care. After receiving the complaint, the Ministry informs the patients on the necessary measures and the solution immediately or in writing if it is not possible to resolve the issue immediately.[[12]](#footnote-12)

### Current practices, legal and institutional framework securing employees’ rights within the Croatian HealthCare service

There are several legal sources for regulating potential retrenchment /lay-offs of the medical or non-medical staff. At the national level, the legal sources are: (i) the Labor Act - the obligation to care for workers after or during the employment termination; (ii) collective agreements - the obligation to provide support and severance pay regulated in collective agreements; and (iii) combination of the above mentioned legal sources or some other specific measures/ program developed for specific workforce group

The severance pay scheme, the right to severance pay is regulated in the Labor Act in Title *"Termination of Employment Contracts" [[13]](#footnote-13)*

# Program Capacity and Performance Assessment

## Environmental management system assessment

### Assessment of the management systems relevant for the Program’s potential environmental impacts

#### Construction works

The experience based assessment is that in general smaller construction practices – such as those foreseen by the Program – in Croatia are conducted in good compliance with the national regulation. In other words, relevant regulatory framework is functioning well. Consequently, there are no relevant systemic weaknesses that should be addressed by the Program’s Action plan.

#### Systematic management, monitoring and accreditation of the quality (including environmental performance) within the HealthCare sector

The establishment of the overall framework is underway. The Agency for Quality and Accreditation in Health Care and Social Welfare started functioning during 2008. Currently, it is very active, but it is still building its own capacity, developing and piloting procedures, testing and upgrading existing legislative framework, focusing currently on alignment of accreditation standards with the methodology defined by the International Society for Quality in Health Care (ISQua).

Accreditation of hospitals as a voluntary process is possible now for more than two years, but no hospital has been accredited in the meantime. It is assumed that the majority of hospitals is probably complying with majority of the quality standards as this is a compulsory requirement defined by the Ordinance (OG 79/11), the monitoring, reporting and control system that would provide credible information regarding the compliance, is yet to be established. The lack of official data is also confirmed through NHCS, where this is identified as one of the five priority problems.

Given the above, a lot of efforts will be required in order to achieve Program’s DLI 6, which specifies targets 60% of accredited hospitals in 2016 and 70% in 2017. This would require technical assistance in various phases of the system establishment, from the finalization of legislative framework, to its piloting and throughout support (both on the sectorial level and the level of individual hospital) to hospitals that should establish and operate required quality management systems.

**More specifically several standard environmental themes are already included in the currently discussed draft of the revised accreditation standards (including waste management, energy efficiency and hospital infections)** which present a positive step in recognition of importance of environmental issues in quality of health services. Considering inclusion of other environmental themes is advised. Although present, these themes are currently scattered across several chapters of the accreditation standards making it difficult to follow. For that reason **a more desirable structuring is suggested by grouping all environmental themes in its own “environmental performance section”.** Such arrangement would then be easier to follow and would more readily translate in standard EMS system which would be one of the subsystems of the quality management system.

### Management systems relevant for other identified HealthCare sector environmental priorities

#### Medical waste management

Although general waste management practices are not satisfactory, medical waste management became an example of how systematic prolonged inspection effort can accelerate positive changes within the system. Thanks to the Environmental inspection’s thematic supervision of medical facilities in period 2008-2010, which covered all public sector medical facilities (as well as major private sector facilities), all of them are today operating very much in compliance with all legal requirements. Namely, all facilities in public sector, and majority of those in private sector, have formal contracts with waste management companies authorized by the MENP. A fair level of selective collection (different type of bins) within facilities is secured through established waste management infrastructure for selective collection at the hospital sites.

The situation is less satisfactory with smaller, private medical facilities – i.e. “small sources” in the Ordinance’s terminology, which implies quantities of less than 200kg per year. Namely, they are signing contract for medical waste removal with authorized company, however, in order to pay less (as total cost of the disposal service depends on quantity), they report and dispose through this channel only a smaller portion of the total waste quantity, while the remaining part they dispose as municipal solid waste. Due to the large number of smaller facilities and not sufficient Environmental Inspection capacity, regular supervision is considered inadequate.

The other area, in which Environmental Inspection identified irregularities, is processing and final disposal of the medical waste, in a sense that the waste is not processed in a way that makes it harmless before its final disposal on landfills. This aspect is regularly supervised and as a consequence licenses were revoked for several authorized companies.

The major space for improvement in waste management practices within the medical facilities in the public HealthCare network is minimization of generated hazardous medical waste quantities through improved selective waste collection – i.e. prevention of mixing of smaller quantities of hazardous waste with larger quantities of non-hazardous waste. The suggested approach, with effectiveness proven on a number of examples all over the world, is **establishment of comprehensive Environmental Management System** as a framework for combination of measures including awareness raising and training of the staff, performance monitoring and control, reporting, improvements in waste collection infrastructure. In addition, **strengthening environmental performance criteria in accreditation system would also contribute to improved waste management practices**.

#### Radiological safety within the medical facilities and radioactive waste

The State Office for Radiological and Nuclear safety is well organized and proactive in initiation of a number of projects (see chapter 1.4) systematically supporting improvements of radiological safety in general and in particular within the medical facilities. Instead of just exercising its inspection role, it is actively involved in awareness raising about the irregularities and theirs consequences, preparation of guidance for the best radiology safety practice in radiology, radiotherapy and nuclear medicine; assistance in acquiring of the equipment needed for higher safety and quality. The State Office has up-to-date and accurate need assessment related to radiological safety in medical facilities. The limiting factor for improvement of the situation, by addressing these identified needs, is lack of funding.

Possible source of funding would be EU funds if radiological safety gets included as an eligible theme in Operative Programs for EU funds as the State Office stands ready with several prepared projects.

State Office is also continuously working on the strengthening of its own capacities. In its Strategic Plan for period 2014-2016 it included several well thought capacity building measures, including self-assessment in line with IAEA (International Atomic Energy Agency) methodology, establishment of the QC system in line with ISO 9001 norm, and preparation of various guidelines for more effective and efficient functioning of its employees on their inspection tasks.

#### Hospital infections

Relevant legislation and established institutional framework is fully in line with WHO standards and recommendations. However, there is still a lot of space for improvement, most notably related to implementation of the established framework (establishment of dedicated organizational unit staffed with trained personnel, enforced implementation of foreseen measures, better monitoring and reporting, etc.), especially at the operational level within the medical facilities.

Hospital infections present growing problem, with increasing number of infections and their frequency of occurrence. According to non-verified data for 2013, over 17.000 patients get infected in the Croatian hospitals annually, out of which around 500 die. The data are just rough approximation, as the monitoring and reporting system is not yet fully established and supervised. The official data are surely underestimation of the real situation, as weak reporting practices in medical facilities means that number of cases reported is lower that number of cases appearing in reality. Some experience based assessment by the representative of the nurse union, is that compliance with the framework and requirements specified in the Ordinance (OG 85/12, 129/13) is very low, with no established and operational specified procedures and teams with trained staff.

Clearly, the issue of the hospital infections deserves to be in the focus of the Program whose objective is increasing quality and efficiency within the HealthCare system, as hospital infections is both deteriorating service quality (by increasing morbidity and disease complications) and significantly increasing hospital treatment expenses (due to prolonged treatment and additionally required medicaments). This is especially so in the current situation in which apparently significant improvements are possible based on mostly better enforcement and control over the implementation of the requirements defined in the adopted legislative framework.

#### Occupational safety within the hospitals

Croatia has well developed regulatory and institutional framework dealing with the occupational safety issue within medical facility. However, the practice differs significantly from what is regulated.

As the foreseen monitoring systems – i.e. monitoring of compliance with the adopted quality standards includes occupational safety and employees’ satisfaction; as well as compliance with voluntary accreditation standards – is not yet implemented, there are no dependable data on the situation with occupational safety, in particular occupational hazards and accidents specific for medical facilities.

The logical first step, and relatively low cost, would be improving of monitoring of the mandatory quality indicators related to the occupational safety. Besides providing sound data baseline for analysis and adaptive planning of corrective measures, it would also contribute to awareness rising regarding the issue, and thus to improve performance within the facility.

#### Energy efficiency in HealthCare sector

Energy efficiency in buildings is very high on the agenda of both Ministry of Economy and Ministry of Physical Planning and Construction. The assessment of EE in HealthCare sector is based on findings and results of the recently completed EE project *House in order* that the MoE has been implementing since 2009 in cooperation with UNDP Croatia.

The first of the project’s activities and results was established monitoring and information system on EE in majority of medical facilities under the Ministry’s jurisdiction (the similar has been done for all the other Ministries).

The analysis of the collected data – around 80% of the total capacities, including all major hospitals, majority of special hospitals and some County hospitals – has shown very poor average energy efficiency of the Croatian HealthCare facilities with average energy consumption is 630kWh/m2, which is more than double relative to European leaders in HealthCare sector energy efficiency, such as Switzerland and Sweden. Energy spending within the HealthCare system makes around 3% of the total budget, which in 2011 amounted to 450 million HRK[[14]](#footnote-14). The savings of 30-5-% of the 3% of the total budget would be clearly significant economic co-benefit of the implemented EE measures in the Croatian HealthCare sector.

Beside establishment of the information system which continuously collects data for approximately 80% of the health facility network[[15]](#footnote-15), the project organized various educational programs which involved over 3000 employees of the MoH[[16]](#footnote-16).

As a conclusion, project *House in order* established the methodology (audits, education, preparation of project pipeline) and developed initial capacities within the system (initial training of potential heads of EE teams in the Ministry and all major hospitals, prepared initial projects in a project pipeline of EE projects for Croatian health sector). All these present a solid foundation for further development and scaling up of EE activities. However, the system’s capacity to capitalize this opportunity is not ye sufficient.

The main barrier identified during the project implementation was lack of coordination and organization within the system and determination/stimulation for implementation on lover levels.

The efficient and effective coordination is necessary prerequisite for effective next steps forward, which includes establishment of the central register, procedures for selection and support of priority projects, securing of the technical assistance for their preparation and implementation.

#### The areas under the jurisdiction of the Sanitary inspection, including: chemicals and biocides safety, environmental noise protection and protection from nonionizing radiation

It can be stated, as an overall comment regarding the functioning and capacities of the Sanitary inspection, that it is functioning well. The first, outcome-based argument is that there are no significant or frequent accidents that would indicate need to strengthen activities of the sanitary inspection. The second, output based argument is that relevant EC authorities, based on their monitoring of compliance with EU criteria during the accession process, confirmed that Croatia fulfilled its EU conditions to have / or have at their disposal suitable laboratory capacities for testing and analysis as well as sufficient number of staff with suitable education and experience, in order to be capable to implement official controls and control task effectively and efficiently.

This said, it should be emphasized that maintaining sufficient capacities should be taken as serious task as a presence of sufficient number of inspectors, well distributed over the territory, with sufficient frequency of control sampling is the key prerequisite for effective preventive functioning of the inspection service, while there are couple of indicators suggesting that the Inspection is working at the limits of capacities of the existing staff.

The situation calls for even more attention if taken into account that on one side, the list of the tasks got longer after EU accession, due to new EU related tasks and additional EU legal requirements, while on the other, the number of inspector is decreasing due to retirements and current restrictive general government policy regarding the new employments of the public servants.

In short, the capacities are already overstretched and there is a high probability that any further reduction of staff or increased workload by introduction of additional tasks would result in decreased inspection effectiveness. This assessment was also firmly confirmed by representatives of the Inspection.

Regarding the three more environment-related areas under the inspections jurisdiction – chemical safety, protection from environmental noise, protection from nonionizing radiation – the situation is as follows:

* MoH prepared well for implementation of REACH Regulation thanks mainly to the IPA 2007 project dealing with Chemical safety, through which the close cooperation with European Chemical Agency was established. As REACH makes industry responsible for assessing and managing the risks posed by chemicals and providing appropriate safety information to their users, the main task of the Ministry remains provision of the support to the industry in implementation of the REACH requirements. The Ministry has established a Helpdesk for chemicals producers, importers, exporters, users and general interested public[[17]](#footnote-17). Croatian Institute for toxicology and anti-doping is also very active and competent in its operative role, providing direct advices and relevant training to industry.
* The Noise Protection Act is being increasingly implemented. According to the Croatian Environmental Protection Agency, only 4% of noise maps were prepared in 2007, while in 2012 two out of the four towns in Croatia with more than 100.000 inhabitants prepared maps, as well as 15 municipalities with less than 100.000 inhabitants, which were not legally required to do so. The fact that they did arguably suggest that: 1) environmental noise is a real problem in many areas; 2) the approach proposed by the Act has been recognized and accepted as a systematic way to deal with the problem.
* The department successfully handles all the tasks related to non-ionizing radiation. The most frequent complaints from the citizens are related to antennas for mobile networks. Following precautionary principle and in order to compensate for the fact that there are three mobile network operating in Croatia, the adopted By-laws orders at least twice stricter limiting values for EM radiation than requested by EU standards. More related to the HealthCare sector, the department is issuing permits for HealthCare institutions doing exams of the personnel working with sources of ionizing radiation (10 in 2013); as well as permits for use of lasers in HealthCare (80 in 2013).

#### Environmental Health & EH Laboratory Services

As there is no dedicated budget line for the Environmental Health programs, the Health Ecology Services is financed solely by selling their services on the market. This in turn directed the Service development to more narrow area for which market exists, which is the area of EH laboratory services (both for various inspections and for industries), while longer term, more comprehensive monitoring and analysis projects, research and intervention programs practically do not exist.

Health Ecology Service is well developed over all Croatian territory, as practically all (18 out of 20) Counties’ Public Health Institutes have established Service and EH laboratory. However, the developed capacities – from 7 Services in 1990 to nowadays 18 Services – are much too high for the current needs, which make existing system highly inefficient and somehow financially unsustainable. Such development was (and still is) consequence of insufficient of even non-existing coordination between different levels of government (i.e. each County is autonomous in its planning) and various sectors that requires similar type of laboratory services (Sanitary inspection, i.e. MoH; but also Ministry of Environment, Ministry of agriculture, etc.).

Accreditation of the laboratories according to ISO 17025 set of norms started in 2003. Currently, practically all laboratories have at least some analytical method accredited, as this is legal prerequisite for all official controls.

No laboratory has yet been accredited as compliant with the Good Laboratory Practice, in a sense of Directive 2004/10/EC.

## Social management system assessment

### Capacity of the task force in charge of the reforms

The National Health Care Strategy (NHCS) 2012-2020 has addressed the following:

* Lack of understanding and rejecting the need for reform measures in the Croatian society.
* Undermined trust in public sector institutions as a result of perceived corruption.
* Regionally uneven economic strength and ability to finance health care.

There are very limited data and researches on the policy process of health care reforms in Croatia. Moreover, there is also no systematic evaluation of the reform outcomes. However, in the last few years through the Bank’s supported projects, the development of strategic planning at the Ministry of Health was initiated. Inter alia, this includes the development of a hospital master plan, health human resources strategy and specific projects in the area of information and communication technology (ICT) aimed at improving the management of the health system and delivery of health services.

Furthermore, according to the 2012 Euro Health Consumer Index[[18]](#footnote-18) Croatia’s score in the category “health outcomes” (measured by infant deaths, cancer deaths relative to incidence, preventable years of life lost, MRSA infections, caesarean sections, undiagnosed diabetes, and depression) was at par with Germany and the UK and higher than 16 other countries. In terms of prevention and the range and reach of services provided, Croatia’s score was at par with Malta and higher than 21 other countries (Health Consumer Powerhouse, 2012). The results of Euro Health Consumer Index confirm capacity of Croatian health care workforce for modern and effective health care.

### Current challenges in securing equity in access to HealthCare services

The National Health Care Strategy) 2012-2020 addresses the equity in access to funds for maintaining or improving health, fairness in distribution of such funds and solidarity among social groups and generations as Fundamental values and principles

As the health is the fundamental value of the Croatian health care system, the health care system has a task *“to provide the constitutional right of every citizen to health care. When organizing the health care system, it is necessary to adhere to fundamental principles pursuant to which every person is entitled to health care and the possibility of achieving the highest possible level of health, in accordance with the provisions of the Health Care Act and the Mandatory Health Insurance Act.”*

Some constrains in securing equity in access to health care services could appear as in the Strategy 2012-2020 with two important weaknesses recognized: health needs assessment is not properly developed in Croatia and human resources planning is limited.

However, the Strategy clearly sets the “Strengthening and better use of human resources in health care”as its Priority 2. The development of a Strategic plan of human resources is based on the rationale that the Healthcare workers are the biggest and the most important resource in the Croatian health care system. As underlined in the Strategy , without a sufficient number of satisfied, protected and properly engaged health care workers it is not possible to achieve appropriate health care of the Croatian population.

### Assessment of the current practices in securing social accountability of the Croatian HealthCare service

The Strategy envisions the health care system in the Republic of Croatia which “will, in an efficient and rational manner, implement the measures of health protection and improvement, as well as treatment and rehabilitation of patients, always governed by scientifically based findings. The system will give patients central and active role, and it will be driven by high ethical and moral standards.” First step toward this vision are Broad Consultations Achieved in the Preparation and Development of the Strategy. Although there is no central website or other source that provides general health system information for the patients, but websites and help lines of the Ministry of Health, the CHIF and the majority of hospitals or other health care institutions provide key information related to publicly-funded health care services and rights, including and some technical information, such as information on waiting times and available treatments. This information has significantly improved the quality of health care, especially after introduction of e-Waiting lists and e- Ordering. The on-line system does not yet provide comparative information on the providers; however, the new contracting model is focused on monitoring KPI’s and QI’s. Hence, we can expect more information on comparisons between providers, followed by user experience, in the near future. Existing models do not provide effective patient or civil society participation in the policy development processes, but there are many positive examples that have to be followed.

Positive example is the approach and the entire methodology used for the preparation and development of the Health Care Strategy 2012-2020 which included professionals and general public. The initial data collection and analyses were conducted by the Coordination Committee, with the help of associates from Croatian National Institute of Public Health and other institutions. Each of the Committees identified the priority problems at a separate Committees were joined by other representatives of key participants in health care in order to discuss strategic issues. Based on the collected data and partnership consultations, a SWOT analysis was drawn up, strategic problems of the Croatian health care system were identified and stra­tegic development directions, priorities and measures were suggested. The final product of the described process was the draft of the Strategy, a document that served as basis for public discussion, and which was officially initiated at the course “Media and Health” on 28 June 2012 in Grožnjan. Formal opinion on the draft of the Strategy was requested from the key participants in the health care system, and the entire public was invited to comment on the content of the document. After the public discussion about the draft of the Strategy, the collected comments and objections were analyzed and they were taken into consideration when drawing up the final version of the Strategy.

Other positive examples are several changes in counties’ health policies and practices that could be attributed to the ”Healthy Counties” project which successfully engaged stakeholders from political, executive, and technical arena. It has involved variety of community groups (youth, elderly, unemployed, farmers, islanders, urban families, etc.), local politicians, and institutions in the needs assessment, prioritizing and planning for health cycle. County Health Plans are accepted politically (by County councils), professionally and publicly. Proposed interventions, for health improvements, rest on local organizational and human resources and are (in the moment in five Counties) financially supported by the County budgets. Assessment of the current practices in securing employees’ rights within the Croatian health care service.

Human resources issues are strongly related to sustainable financing of Croatian health care system, as exemplified in the fact that healthcare workers’ salaries are the primary cost driver in Croatian hospitals. Also, Croatia’s accession to the EU in 2013 is posing significant new challenges to the human resource capacity, as it is expected that part of the workforce will move to other EU countries. Program activities, primarily planned rationalization of the health facility network and health services could further increases regional disparities in job opportunity within the sector between rural and urban areas and different Croatian regions. More information on this will be available after completion of the Hospital master plan and Human resources strategic plan expected in early 2014. In terms of potential retrenchment /lay-offs of non-medical staff existing legislation will provide equal conditions and rights as for any other workforce group.

**According to *“Analysis of the Severance Pay Scheme in the Republic of Croatia: current arrangements and changes to be considered” /***World Bank report prepared at the request of the Ministry of Labor and Pension System of the Republic of Croatia - September 2013/ “*It is important to differentiate three sectors in the analysis of the scheme. The first relates to the public sector, which is well protected by collective agreements and where severance pay is generous. Then there is the system of insurance of protection of claims by workers in the case of bankruptcy, conducted by the Agency for Insurance of Workers' Claims in the Case of the Bankruptcy of the Employer. The third part is the most comprehensive, relating to workers in the private sector, whose rights to severance pay are regulated by the general provisions of the Labor Act, or individual”*

# Suggested areas of improvement and inputs to the Program Action Plan

## Environmental aspects related suggestions for improvement

Table 6 presents summarized ESSA proposed measured, described and discussed in more detail further in this chapter.

Table 6 Summary of ESSA proposed measures - actions

|  |
| --- |
| **MEASURES IMPORTANT FOR AVOIDING POTENTIAL NEGATIVE ENVIRONMENT RELATED IMPACTS AND MAXIMIZING POTENTIAL ENVIRONMENT-RELATED BENEFITS OF THE CURRENTLY PROPOSED PROGRAM** |
| 1 | TA to Agency for Quality and Accreditation in Health Care and Social Welfare in foreseen implementation of hospitals’ accreditation (in line with the accreditation scheme that includes environment-related accreditation standards) |
| **MEASURES WHICH PROACTIVELY ADDRESS ENVIRONMENT-RELATED PRIORITIES AND OPPORTUNITIES WITHIN THE HEALTHCARE SECTOR, WHICH ARE NOT ADDRESSED BY CURRENTLY PROPOSED PROGRAM** |
| **MEASURES RECOMMENDED FOR INCLUSION IN THE PROGRAM** |
| 1 | Technical assistance to Croatian State Office for Radiation and Nuclear Safety in Preparation and implementation of projects improving radiological safety within the medical facilities |
| 2 | Technical assistance to the Agency for Quality and Accreditation in Health Care and Social Welfare in establishment of fully operational monitoring of the hospitals’ compliance with adopted mandatory quality standards |
| 3 | TA to the MoH in its role of coordinator and facilitator of preparation and implementation of EE projects in the HealthCare sector |
| **MEASURES RECOMMENDED FOR INCLUSION IN THE NEXT UPGRADE OF THE NHCS AND FORTHCOMING PROGRAMS SUPPORTING ITS’ IMPLEMENTATION**  |
| 1 | Establishment of the comprehensive permanent program dealing with the continuous active greening of the Croatian HealthCare sector |
| 2 | Securing sufficient capacity of the Sanitary inspection by reassignment of some staff currently employed in Health ecology service of Public Health Institutes |
| 3 | Upgrading of the Health Ecology Services from current status of the provider of EH laboratory services to the main implementer and coordinator of wider set of standard EH tasks and projects  |

### Measures important for avoiding potential negative environment related impacts and maximizing potential environment-related benefits of the currently proposed Program

The Program as it is currently foreseen has no significantly potential negative impacts, whose proper management would require additional capacity building activities within the existing relevant systems.

To summarize, the only potential negative environmental impacts can be caused by:

1. Improper construction practices in foreseen activities dealing with minor reconstruction and rehabilitation of the existing medical facilities;
2. Improper management of foreseen measures aiming for savings within the system, most notably better controlled more centralized procurement procedures and outsourcing of non-medical services.

The conclusion of the analysis in the ESSA was that

1. Experience with similar minor reconstruction works in Croatia shows that the relevant regulatory framework is functioning well in practice and that potential impacts are expected to be easily mitigated, short term and site specific;
2. All potential negative impacts of above listed foreseen costs-cutting activities can be avoided by well-prepared implementation of the foreseen activities.

Regarding the potential environment-related benefits of the currently proposed Program, it was concluded that:

1. Expected improvements in environmental performance of the facilities due to their foreseen reconstructions and modernizations will happen by default, as unavoidable consequence of the facilities’ modernization in nowadays more environmentally advanced policy and technological context.
2. Capitalization of the potential benefits coming from foreseen establishment of the quality monitoring and accreditation practice (with included environment-related accreditation standards) requires investment of additional effort, as the currently existing capacities of the relevant management systems are relatively weak, while the task itself is rather complex and demanding.

Consequently, the only measure proposed – related to mitigation of potential negative impacts and maximization of potential positive impacts of the currently foreseen Program – is the Technical Assistance to the Agency for Quality and Accreditation in Health Care and Social Welfare, which is necessary in order to achieve high targets set by the Program, related to the monitoring of quality standards and hospitals accreditation (namely 70% of hospitals until 2017).

#### Technical assistance to Agency for Quality and Accreditation in Health Care and Social Welfare in foreseen implementation of hospitals’ accreditation (in line with the accreditation scheme that includes environment-related accreditation standards)

The measure includes TA in all phases of the system establishment, from the finalization of legislative framework, to its piloting and provision of constant support to hospitals that should establish and operate required quality management systems that will eventually be accredited.

Although several standard environmental themes are already included in the currently discussed draft of the revised accreditation standards (including waste management, energy efficiency and hospital infections) these themes are scattered across several chapters of the accreditation standards making it difficult to follow. A more desirable structuring is suggested by grouping all environmental themes in own “environmental performance section”. After amendments, TA should focus on piloting of EMS systems in selected number of interested partner hospitals, as subsystem of the accredited overall quality management system.

Such integration of environmental criteria into the set of quality criteria for accredited quality within the Croatian HealthCare sector, would be excellent first step for systematic long-term “greening process”, while it does not distract Program from its original focus, as establishment of the quality monitoring, management and accreditation is among its central and most challenging objectives, which requires TA anyway.

### Measures which proactively address environment-related priorities and opportunities within the HealthCare sector, which are not addressed by currently proposed Program

#### Measures recommended for inclusion in the Program

##### Technical assistance to Croatian State Office for Radiation and Nuclear Safety in Preparation and implementation of projects improving radiological safety within the medical facilities

The implementation of the Program itself would through improved quality and modernization contribute to the improved radiological safety within the medical facilities. Supporting specifically these types of projects presents a relatively small investment that would bring significant returns both in the quality of provided HealthCare service in a sense of maximization of benefits from diagnostic, interventional procedures and therapy while minimizing harmful effects of the radiation, and in environmental safety and occupational safety of the medical staff.

Measures required for improvement of the situation includes acquisition of missing equipment, including radiation detection and quality control equipment, modernization of the obsolete equipment, education and training of the staff, preparation of the Standard Operational Procedures guaranteeing maximum level of radiation safety. Croatian State Office for Radiation and Nuclear Safety had prepared projects based on the recently completed need assessment in the radiology, radiotherapy and nuclear medicine departments in medical facilities.

In order to secure eligibility for co-financing from EU structural funds, inclusion of “Improvement of radiation safety within the medical facilities” among objectives in relevant Operational Programs for period 2014-2020, would be beneficial.

##### Technical assistance to the Agency for Quality and Accreditation in Health Care and Social Welfare in establishment of fully operational monitoring of the hospitals’ compliance with adopted mandatory quality standards which includes also cover issues of hospital infections and occupational health within the medical facilities

As already emphasized, establishment of the fully operational monitoring of the hospitals’ compliance with adopted mandatory quality standards is very demanding task whose successful completion have many significant positive impacts. Not only that it would provide credible and accurate baseline, which is necessary prerequisite for successful ongoing adaptive planning and management of corrective measures, but it would certainly positively contribute to awareness rising regarding the issue, as well as to the improved performance within the facility.

More specifically related to the issues of hospital infections and occupational health within the medical facilities, the proposed measure also presents relatively low-cost and low-effort first step, as the required investment in TA needed for establishment of effective monitoring and reporting framework are insignificant when compared with the high costs (both in human lives and increased costs of treatment) caused by the hospital infections and staff injuries.

##### TA to the MoH in its role of coordinator and facilitator of preparation and implementation of EE projects in the HealthCare sector

The measure is fully compatible with the program focus, the NHCS, accreditation criteria and other national development goals. Namely, a higher energy efficiency of the premises is fully in line with the Program objectives, as it positively contributes to all three: efficiency, service quality, financial sustainability.

Preparation of projects improving EE of the HealthCare sector 1) is “greening” of the reorganization / reconstruction / restructuring projects foreseen by the Program; 2) it will bring significant returns in savings, in absorption of EU funds, in environmental benefits, on relatively small investments in human capacities and TA for EE program and projects management and implementation.

The inclusion of EE measures among the reform’s priorities is stipulated by the NHCS 2012-2020. In elaboration of the Strategic priority 4, which addresses *Reorganization and restructuring of the medical facilities*, the Strategy explicitly requires reconstructions of the hospitals to be also directed towards improvement of EE, which will result in the savings related to the system’s operative costs, while also contributing to fulfillment of one of the Europe 2020 strategy key goals: 20% increase in EE.

The measure would consist of TA to the MoH in continuation and up-scaling of the practices established by the *House in order project*. Namely, in line with the established model, EE teams should be established in the Ministry and in the medical facilities. The teams will be formed as a task group, consisting of the existing employees from services that deal with infrastructure maintenance, environmental protection and quality control and assurance. Implementation of highly specialized technical tasks – such as energy audits, preparation of the technical project documentation, and writing of the applications for EU funds – will be supported by external TA. The team’s concrete tasks / activities include: organization of Energy audits; identification of EE measures; preparation of the technical documentation for the EE projects; application for co-.financing from EU structural funds (of individual project, or groups of similar projects, if it increase efficiency).

A majority of internal prerequisites exists: a staff which is already partially trained, or can be easily trained; best practice example of what should be done demonstrated by the *House in order* project. What is required is decision of the top management and removal of organizational barriers that could hinder effective cooperation between the Ministry on one side and medical facilities on the other, as implementers of the concrete EE projects.

#### Measures recommended for inclusion in the next upgrade of the NHCS and forthcoming programs supporting its’ implementation

These are measures that do not qualify by the adopted criteria for inclusion into the Program, which are however of critical importance for systematic long term greening of the HealthCare sector in Croatia, which should become one of the objectives in the future NHCS. Namely, as already mentioned in the section 1.3.1.3, the HealthCare sector all over the world is more and more recognizing its responsibility for its environmentally sustainability. The World Health Organization in its recent publication, *Healthy hospitals, healthy planet, healthy people*, recognizes that health sector, as one of the most trusted and respected sections of society and one of the largest employers and consumers, has both a responsibility and an opportunity to play a leading role in ongoing transitions to more environmentally sustainable economies and societies, with significant health, economic and social co-benefits. In many countries this growing environmental awareness has already resulted in initiation of the comprehensive, long-lasting programs with mandate to systematically and continuously work on improvements of environmental performances of their HealthCare systems. Some of the examples include:

* *HealthCare Without Harm* international coalition ([www.noharm.org](http://www.noharm.org));
* *Global Green and Healthy Hospitals (GGHH)* international association / network, with over 3500 thousands member hospitals and HealthCare systems from all continents;
* *Practice Greenhealth* network in USE, established through common initiative of Environmental Protection Agency and American Hospitals Associations, which since its establishment in 1998 until 2006 engaged over 7.000 medical facilities in USA;
* *Canadian Coalition for Green HealthCare*;
* *Sustainable Development Unit established by the National Health Service (NHS) England* ([www.sdu.nhs.uk](http://www.sdu.nhs.uk)), with mandate to support transformation of NHS England into leading sustainable and low carbon service;
* *Green Hospital Program and Green Hospital Alliance* initiated in Germany.

All of them have on their agenda the themes listed in the section 1.3.1.3, with the main mandate to inform, motivate, educate, engage, support HealthCare facilities in their efforts to become more environmentally sustainable.

##### Establishment of the comprehensive permanent program dealing with the continuous active greening of the Croatian HealthCare sector

**The ESSA recommendation is** to secure efficient and effective integration of the environmental and sustainability considerations into the forthcoming reform of the Croatian HealthCare sector through establishment of national program that would follow the example of the above listed programs.

This measure would be logical widening of the already recommended measure dealing with improvement of the environmental efficiency of the Croatian HealthCare sector. Namely, it would follow the same organizational logic with the Green program team at the Ministry as the champion of the process, and Green teams within the medical facilities as the implementers of the concrete projects, most probably within the framework of established formal Environmental Management System (EMS).

##### Securing sufficient capacity of the Sanitary inspection by reassignment of some staff currently employed in Health ecology service of Public Health Institutes

As the sanitary inspection already operates with smaller staff than required by both EU criteria and criteria stated in the national Law on sanitary inspection, they should be exempted from all potential future staff reduction in line with some default formula applied on all of the public sector (e.g. 1 newly employed for 2 retired or similar).

A possible solution to strengthen the Inspection’s human capacities without additional financial burden on the system as a whole would be to transfer some of the staff from Health Ecology Services – which are in many cases over capacitated (measured by criteria of laboratory analysis performed annually per employee), while their staff have educational background and experience required for sanitary inspectors. The details of such reorganization are out of the scope of this ESSA study, however, the fact that, within the same system, there are two subsystems, one suffering from lack of capacities, the other from over developed capacities, while these capacities are interchangeable, suggests that there is possibility for reorganization that would result with improved overall effectiveness and efficiency.

##### Upgrading of the Health Ecology Services from current status of the provider of EH laboratory services to the main implementer and coordinator of wider set of standard EH tasks and projects

The existing network of Health Ecology Services within the network of Public Health Institutes has significant capacity which is currently used in less than optimal way. This was already recognized in the Strategy’s elaboration of the Strategic Priority 4 (Reorganization and restructuring of medical facilities): i.e. *efficiency and effectiveness of the network of the Counties’ Public Health Institutions could be increased through establishment of some logical Unions, functional or institutional merging, and concentration of the capacities and excellence for different kinds of expertise on one location within the Union. The prices for the services should be same in all PHI’s. The procurement should be centralized*.

The way to strengthen both effectiveness and efficiency of the service is to 1) introduce more rational planning of development of the laboratory capacities than it was until now; 2) improve efficiency of the laboratories measured by number of analysis per employee by offering reassignment in Sanitary inspection; 3) widening the set of the Services’ tasks from the EH laboratory analysis to the standard set of EH tasks and projects.

## Social aspects related suggestions for improvement

### Recommendations for improvements of the system’s change / reforms management capacities

Efficient public information outreach and communication campaigns need to be developed as to emphasize that the prime objective of the reform is not reduction of the system but allocation toward more efficient health care and increased quality. Also, the Program on long term perspective have to explain and argument that existing model of health care does not provide services (in quantity and quality) in relation to present high expenditures. It is important to communicate that proposed measures do no not only deal with reductions and savings, but also bring quantifiable improvements in quality of services received by to show increasing benefits for citizens (e.g. number of new services in palliative care, new beds/facilities in long term care).

### Recommendations for improvements of equity in access to HealthCare services

Possible Program activities could be used to build up system's capacity to implement social accountability activities and improve existing practices implemented to raise the voice of the patients and civil society in formulating health policies and programs, at local and national level. One of the key objectives could be to improve patient’s feedback on quality of health services and responsiveness. To assure comprehensive and sustainable partnership with patients and citizens, existing grievance procedure could be improved and better regulated (standards for responding to grievances received, availability of records, communication outreach practices, information flow, consultation process and transparency/access to information.)

# Annexes

## Matrix summarizing the proposed corrective actions / mitigation measures, including corresponding indicators of completion

Will be added…

## Description of implemented public consultation plan / minutes of public consultations / summary of feedback received during the consultation process

The public consultations related to the subject of this ESSA report, its’ scope, findings and recommendation have been implemented in two rounds.

In the first round, at the very beginning of the ESSA process, the key stakeholders were engaged individually, in form of series of meetings. The objective of the meeting was to identify:

* appropriate scope of the ESSA,
* the main challenges of the present situation relevant for the Program,
* the main challenges which will probably be faced during the implementation of the foreseen Program’s activities;
* Potential modification and upgrading of the Program that could make it more effective and efficient in its goal of Improving Quality and Efficiency of Health Services in Croatia.

Findings of all these consultations were used as important inputs in the preparation of the Draft ESSA report.

The second round of the public consultation was (WILL BE …) organized as presentation, discussion and final verification of the Draft ESSA report, with invited representatives of all key stakeholders, while open for participation for all the other interested public.

An important fact to be emphasized is that the Program is supporting implementation of the selected priority activities identified in the NHCS 2012-2020, whose preparation and verification also included wide consultations with all the key stakeholders.

Finally, the Draft ESSA was open for comments on the web pages of both MoH and WB.

Following sections presents summary of the minutes from the two phases of the consultation process.

### Initial meetings with representatives of the key stakeholders

#### Consultations related to environmental issues

|  |  |
| --- | --- |
| NAME OF INSTITUTIONS AND THEIR CONTACTED REPRESENTATIVES | THE MAIN INSIGHTS / COMMENTS / SUGGESTIONS / CONCLUSIONS FROM THE MEETINGS |
| **The main topic discussed: QUALITY STANDARDS AND ACCREDITATION STANDARDS** |
| Agency for Quality and Accreditation in Health Care and Social WelfareMs Jasna Mesarić, the Agency director and Head of the department for quality and education in HealthCare and social welfareMs Maša Bulajić, Head of the department for accreditation in HealthCare and social wellfare | Current phase in establishment of the envisioned HealthCare quality monitoring and accreditation framework was discussed, with emphases on the forthcoming steps, including finalization of the accreditation scheme in line with ISQ methodology and requirements; initial steps in gradual establishment of the monitoring and reporting on the mandatory quality indicators in hospitals. It was agreed that task in from of the Agency is both very important for the success of foreseen sectorial reforms and improvements, and also very demanding. It was agreed that TA would be extremely beneficial in this pioneering phase, especially, in the context of rather ambitions targets set by the Program (70% of hospitals accredited by 2017).  |
| **The main topic discussed: THE HEALTHCARE SECTOR AS A POLLUTER; OPPORTUNITIES FOR GREENING** |
| Ministry of environmental and nature protection / ENVIRONMENTAL PROTECTION INSPECTION (EPI) Ms Jasna Paladin Popović, the Chief Environmental Inspector  | The inspection has been officially (in written) consulted regarding their most recent insights and suggestions related to the environmental performance of the public HealthCare facility network. No response was received, but EPI’s direct participation has been eventually assessed as not necessary, as the used EPI’s official, publicly available reports covering period 2008-2010 was assessed as sufficient for the assessment, and no measures were recommended for inclusion into the Program that would require more accurate up-to-date information from the EPI. |
| CLINICAL HOSPITAL CENTER ZAGREB: Ms Draženka Topolovac, Head of the service for environmental protection, quality, and deratization / dezinsection / disinfection  | KBC Zagreb is the largest medical facility in Croatia: build area of 150.000m2; 5.500 employees. Their team of three (Ms Topolovac, associate and nurse acting as overall coordination of the waste management system) is in charge of all environment-related issues. Clearly, in their work they collaborate with many other services, including technical service for issues related to all kinds of infrastructure, etc. They have been regularly supervised by all relevant inspections (Environmental for waste and air; Water inspection for Waste waters). Ms Topolovac confirmed that the regular supervisions of the Environmental Inspection accelerated development of the current environment management systems. She described rather complex medical waste management system that collects separately 40 different types of waste, at 6 main locations. They generate around 1 t/day of medical waste in the largest facility (Rebro), while in other five they generate around 200-300kg/day. Legal person authorized for collection and processing of the medical waste is selected every year, as a result of public procurement, with 1 year contract. They currently have contracts with two authorized waste operators: one for the infectious waste, which is by far the biggest share in total waste quantities, the other for all the other types. As part of the hospital preparation for formal quality accreditation, they prepared several guidance for employees defining SOP’s for various environment related tasks, including waste management and procedures for accidental situations. Emissions into air decreased as a consequence of reconstructed infrastructure. Croatian Electro power Company (HEP) is maintaining their central Heat generating unit, which is currently not operative, as they are connected on the municipal heat network. They are also regularly monitoring emissions into air and waste water. They have waste water pretreatment plants next to the kitchen and next to the department for nuclear medicine. They were actively involved in the House in order project promoting Energy efficiency in buildings owned and/or governed by public sector. Within the project they prepared documentation for modernization of one boiler, and implemented one rationalization project connecting hot water systems on two sites.The priority measure for the next short term period is getting in compliance with the requirement for phasing out ozone depletion gasses from their refrigerating units. She doesn’t see a lot of space for improvements related to their waste management system (as they already have it quite elaborated and well established), however, she agrees that they are probably not a good example of an average Croatian hospital, which has less capacities for implementation all these systems. She agrees that there is a space for greening of the food procurement procedures, as otherwise they are forced to select offers based on only smaller price criteria, which often come at the cost of the quality. Regarding Energy efficiency, there is a lot of space for improvement, but their technical service cannot do it on their own, without targeted external TA.  |
| Ms Karmen Virč, general manager in Ekoplanet Ltd – a company specialized for medical waste management, which also implement various educational programs on subject, and recent awardee of the Green mark for excellence in in green businesses | Confirmed, based on personal experience and communication with peer companies that larger sources (which include all public sector medical facilities) are in compliance with the legal requirements. The “whole in the system” are numerous smaller producers, that all together generates significant amounts of medical waste, while because of their number, they are harder to control. Many smaller sources formally fulfill their legal obligation – i.e. sign contract with the authorized collector of medical waste – however they are throwing major part of the collected medical waste together with municipal solid waste – which is forbidden, but also not easy to control and track down. An anecdote with a private dental medicine clinic says that after being subjected to the Environmental inspection upon report from the neighbors that in their garbage containers observed significant quantities of potentially infectious waste, reported quantities has increased from 10dkg to 20kg!!  |
| Environmental Protection AgencyMr Vibor Bulat, related to the subject of medical waste | Mr Bulat directed us on relatively recent report Medical waste management in Croatia issued by EPA. An important remark was that even some of the hospitals are not fulfilling their obligation of reporting on generated medical waste to the Register of environmental polluters.  |
| **The main topic discussed: RADIOLOGICAL SAFETY AND RADIOACTIVE WASTE WITHIN THE HEALTHCARE SECTOR** |
| State Office for Radiological and Nuclear SafetyMs Ivana Kralik – Head of the sector for radiological safetyMs Nevenka Novoselec – Head of the Unit for Project Implementation  | Situation with radiological safety in hospitals is not neither satisfactory nor in line with the adopted legislation (e.g. some obligations from Ordinance adopted in 1999 are implemented only in two hospitals). Both provided service quality (in a sense of getting results with the least possible harmful side effects, most notably at radiology departments) and safety (in a sense of safe handling and management of the radioactive substances, primarily in nuclear medicine departments which use unsealed sources) are not satisfactory. The situation differs among hospitals, mainly as a function of the “human factor” (education and motivation of the staff in charge). KBC Rijeka and KBC Osijek could be role model for others. Regarding the radioactive waste from medical facilities, majority of larger sources acquired more recently are returned to the seller, after it complete its lifecycle in the medical facility. Older sources, such as Cobalt units are mainly replaced by linear accelerators technology. All sealed sources are handled in line with procedures – if not needed, first offered to someone interested, or returned to producer, or deposited in the central national depot for radioactive waste – with no exception. The problems with radioactive pollution are possible in nuclear medicine departments that use unsealed / open sources. The State Office – which has double role of inspection and advisor / provider of Technical Assistance to those dealing with sources of radiation – is currently intensively working on improvement of the situation. The main activities include: education, awareness raising, preparation of guidance for the best radiology safety practice in radiology, radiotherapy and nuclear medicine; assistance in acquiring of the equipment needed for higher safety and quality. The State Office has up-to-date and accurate need assessment related to radiological safety in medical facilities. The limiting factor for improvement of the situation is lack of money. Up to now, a subject of radiological safety was not included as an eligible theme in Operative Programs for EU funds, meaning that they could not use EU funds for their important and urgent work. If included in Operative Programs which are currently under preparation, for period 2014-2020, they have already prepared projects waiting for financing.  |
| **The main topic discussed: ENERGY EFFICIENCY** |
| MOH:Mr. Dario Sambunjak, Minister’s advisor for strategic planningMs Štefica Tošev – operational focal point for EE theme within the Ministry | Ms Tošev confirmed the model established by *House in order* project – awareness raising and education, followed by audits identifying EE measures, followed by preparation of documentation and eventually implementation of EE projects - as effective. Actually, she is currently collecting up-to-date data on the status of medical facilities within the system regarding the Energy Efficiency measures (do they have energy certificates?; do they plan some EE projects?), which will serve for preparation of the need assessment and envisioning of the activities that will facilitate preparation and application of the EE projects for EU co-financing (TA for preparation, grouping of the projects in order to get project of suitable size for financing from EU structural funds, etc). Mr Sambunjak emphasized a lack of capacity within the Ministry (no person dedicated to the subject of EE as the core business, while the situation at the level of individual medical facility is even worse, in a sense that they have rather limited capacity for initiation of projects, in addition to their standard functioning) and lack of systematic support from institution that has EE as part of their core business (Ministry of economy, Fund, State Real-Estate Agency) as the main barriers for more active preparation and implementation of the EE projects within the Croatian HealthCare system. Having on mind rather limited capacities for initiation and management of changes and upgrading within the system, there is objective risk that any newly added measure / project distract attention from the reform’s absolute top priorities, which does not include EE projects, as they are neither the system’s core business, nor they can bring savings comparable with currently generated deficits within the system that will be addressed by the Program.  |
| **The main topic discussed: THE AREAS UNDER THE JURISDICTION OF THE SANITARY INSPECTION, including: chemicals and biocides safety, environmental noise protection and protection from nonionizing radiation** |
| SANITARY INSPECTION: Mr. Bojan Vidović – Head of Service for Legal Support and Expert surveillanceMs Biserka Bastijačić Kokić – Head of department for Chemicals and Biocidal products;Ms Jasna Mesarić – Head of Department for Objects of Common Use and Noise Protection;Mr Zdenko Pavković – Head of Department for Radiation protectionMs Marija Pašalić, Ms Kristina Blagojević – Department for Food safety  | The main comment of all contacted representatives is that Sanitary inspection is already understaffed; age structure of the staff is such that in the following years, the situation will rapidly deteriorate; employments of replacements are not allowed. The result is threat to normal functioning of the Inspection.In some regions, for some areas, the capacities are really overstretched – up to 1 inspector per 35000 inhabitants (the Law requires 1 per 15.000!) They are trying to compensate lack of capacities by more rational allocation of the existing capacities, taken into account areas of the highest risk (e.g. touristic coastal area during the summer, or focus on fairs during the festivities) as well as results of the previous inspections and preliminary screenings. The newly adopted EU legislation, and obligations resulting from that, is serious challenge for all subjects affected by these changes. The smaller they are, the larger the challenge, as requirements are almost the same for SMEs as for large companies, while SMEs often lack administrative capacities and in-house know-how required for fulfillment of the legal requirements.If they were better capacitated, they could spend more time advising and educating those SME’s. As it is not the case, they simply have no time to do that, while based on their experience that would be necessary. Some of the inspectors expressed concern regarding the restructuring and reorganization foreseen in the Program, as in their experience, reorganizations are often insufficiently prepared, and therefore although in theory they should improve efficiency and effectiveness of the system, in practice, they result with opposite, as new rules slow down or even block the system.  |
| CROATIAN INSTITUTE FOR TOXICOLOGY AND ANTIDOPINGMr Zdravko Lovrić, director | The issue of implementation of Ordinance on Good Laboratory Practice - GLP (OG 38/08), as well as associated National Program for surveillance of compliance with the principles of GLP (OG 61/12)have been clarified. Namely, although the Article 13.4 of REACH Regulation (EC) No 1907/2006 requires that ecotoxicological and toxicological tests and analyses shall be carried out in compliance with the principles of good laboratory practice provided for in Directive 2004/10/EC or other international standards recognized as being equivalent by the Commission or the Agency ... (with remark that No other international standards have yet been recognized as being equivalent to GLP, the fact that no Croatian laboratories has been yet accredited in line with Ordinance is not barrier to implementation of the REACH regulation in Croatia, because laboratory tests are required only as part of the registration of new substances, and no Croatian legal person dealing with chemicals has such needs. Also, regarding the registration process at ECHA (European Chemicals Agency), although it is rather demanding for the smaller companies, it is facilitated through the mechanism of Substance Information Exchange Forum (SIEF), through which groups of chemicals producers and traders dealing with specific substance, led by the market leaders for that substance share costs, join capacities and prepare common study / register for the substance, which is later on customized by specificity of each legal entity registering at ECHA.  |
| **THE MAIN TOPIC DISCUSSED: ENVIRONMENTAL HEALTH & EH LABORATORY SERVICES** |
| CROATIAN INSTITUTE FOR PUBLIC HEALTHMr. Krunoslav Capak – deputy director of the Institute and Head of the Health ecology service within the Institute  | The area of Environmental Health not sufficiently developed in all its components, as a lack of stable financing and management from the level of the Ministry. Health Ecology Services within the Public Health Institutes rely for financing only on market, which directed them to develop only laboratory capacities, while it could / should be much more: coordinator of inter-sectoral cooperation in area of Environmental Health; promoter / coordinator / facilitator of the Greening Program within the Health Sector; the main implementer of the comprehensive long term monitoring and analysis programs, which would provide data for environmental health indicators, which is the foundation for the evidence-based planning of the public health policies, prevention measures and activities.  |
| ENVIRONMENTAL PROTECTION AGENCYMs Mira Zovko, related to the general area of Environmental Health | She confirmed that the area is still relatively undeveloped, partially because of its intrinsic complexity, but also because of a vertical separation of the jurisdiction and lack of cooperation and coordination required for harmonized action by several Ministries.  |

#### Consultations related to social issues

To be added …

### Presentation and discussion of the Final draft ESSA report at the WS with invited representatives of all the key stakeholders and other interested public

To be completed after the WS …

## A brief assessment of Integrity issues related to the Program

The three main areas identified as relevant for the assessment include:

* Transparency, integrity and accountability in selection of the activities included in the Program;
* Systems capacity to handle risks of fraud and corruption throughout implementation of the Program activities;
* Integrity issues within the Croatian health sector supported through the Program.

### Transparency, integrity and accountability in selection of the Program’s activities

The first step in assuring transparency, integrity and accountability in selection of the activities included in the Program was made by focusing Program activities on the strategic problems and priorities identified in recently adopted NHCS 2012–2020, preparation of which included a wide consultation and a consensus building among all key stakeholders. The current doctors and nurses strike indicates that implementation of the reforms listed in the Strategy will not pass without strong oppositions and disagreements when it comes to operational details, however, the general consensus has been achieved among the key stakeholders regarding the strategic problems and priorities identified in the Strategy. Consequently, PforR also supports necessary reforms identified and selected through open democratic process.

Transparency and accountability in selection of the concrete activities supported by the Program will be secured through consultations and negotiations with the key stakeholders which will happen before adoption of any of the foreseen Action plans for implementation of the Strategy, including Master plan for hospitals and others. The current strike again indicates that these processes will have to be wide open and very thorough in order to get the implementation documents accepted by critical mass of the key stakeholders.

Consequently, it is fair to conclude that the PforR will support implementation of priority reform measures and activities of the Croatian Health Care System, which have been and will be identified and selected through open democratic process.

### Systems capacity to handle risks of fraud and corruption throughout the Program implementation

The most solid aggregated indicator of the borrower’s systems capacity to handle risk of fraud and corruption is the recent Croatian EU membership, as establishment and proven reasonable effectiveness of all systems relevant for handling of fraud and corruption was one of the key and the most scrutinized criteria for Croatian EU membership.

More specifically, Croatia has EU harmonized legislation framework and institutional arrangement for public procurement. The main law regulating the subject of public procurement including the procedures for submission and processing of complaints is [Public Procurement Act](http://www.javnanabava.hr/userfiles/file/ZAKONODAVSTVO%20RH/ENGLESKI/ZAKONI/Public%20Procurement%20Act-OG%2090-2011.pdf) (Official Gazette 90/2011, 83/2013) that enters into force on 1 January 2012.

As stipulated by the [Act on the State Commission for Supervision over Public Procurement Procedure](http://www.dkom.hr/UserDocsImages/www.javnanabava.hr/userdocsimages/userfiles/file/ZAKONODAVSTVO%20RH/ENGLESKI/ZAKONI/Act%20on%20SC%20OG%2018-2013.pdf) (Official Gazette 18/2013), the central body responsible for handling of all complaints on the public procurement in Croatia is the State Commission for Supervision over Public Procurement Procedure. The State Commission standard procedures are in line with the highest standards of transparency and accountability, all their decisions being publicly available on their web portal ([www.dkom.hr](http://www.dkom.hr)), with content available both in Croatian and English languages.

The State Commission has five members, one of whom acts as the Head, and one as Deputy Head. They are appointed by Croatian Parliament on the proposal of the Croatian Government. Three members of State Commission, one of which has to be Head or Deputy Head, constitute a quorum necessary for decision-making. Decisions of the State Commission are passed by a majority vote at the council meetings. No Commission member shall abstain from voting.

The State Commission submits to the Croatian Parliament annual reports on its work (if requested by the Parliament, reports are submitted for a period shorter than one year). The report includes data and analyses concerning legal protection in public procurement procedures, granting of concessions and selection of private partners in public-private partnership projects. The reports has specified content, including the data on: total number of the appeals received; the number of appeals received by individual stages of the procedure; the number of cases categorized by various possible outcomes (e.g. dismissed, rejected, upheld or suspended appeal procedures; approval of continuation of the procedure and /or award of a public procurement contract; annulled decisions, procedures and actions of the contracting authorities due to unlawfulness; annulled public procurement contracts); the number of fines levied and the amounts thereof; average time for adoption of decisions both form the date of receipt of appeal and from the date of completion of the appeal case documentation; the contracting authorities having five or more appeal procedures before the State Commission, including the number of legitimate appeals in such appeal procedures and the total number of implemented appeal procedures related to the concerned contracting authorities; the most common reasons for lodging appeals; the most common irregularities established by the State Commission; legal actions against the State Commission’s decisions; the number of submitted accusatory motions.

According to the Report, in 2011., altogether 1.921 complaints were received (7,61% of the total number of the public procurement procedures in Croatia in 2011.); out of which 1.888 were solved until 31.12. Approximately ¼ of complaints were adopted, resulting with annulation of the public procurement process, while ¼ was rejected and ¼ dismissed. Seven charges were filed at court for violation of the Law on public procurement. Contracting authorities having five or more appeals included also a number of the hospital and clinic centers, as they are relatively frequent buyers; however, percentage of the adopted complaints in their case was below average. The total value of public procurements that were scrutinized because of the complaints was above 3,5 billion USD. The average time for adoption of decision was 61 days, while average public procurement duration was 63 days.

In line with the Regulation on control over the implementation of the Public Procurement Act (Official Gazette 10/12), the Ministry of economy is the central governmental body responsibility for control of the law implementation, meaning that it also has to react (within 8 days period) based on the received complaints related to some public procurement procedure. If the law violations are confirmed, the Ministry files charges against responsible parties at court.

The main body within the Croatian criminal justice system in charge of anticorruption is Bureau for Combating Corruption and Organized Crime (generally known as USKOK) attached to the State Attorney office, formed in 2001, whose functioning is regulated by Law on Bureau for Combating Corruption and Organized Crime (Official Gazette 76/09, 116/10, 145/10, 57/11, 136/12). It has a counterpart in the Criminal Police Directorate (the Police National USKOK), as well as in the judiciary (the Court Departments for Criminal Cases in the Jurisdiction of USKOK). Already completed and still ongoing processes against the highest political figures in Croatia (including the former Prime Minister and some other Ministers) are fair indicators of the system’s capacity, operative effectiveness and independent functioning. Any potential allegations of fraud and corruption in the Program should be submitted to USKOK, which will then react by initiating investigative procedure.

As a conclusion, the systems handling the risks of fraud and corruption in implementation of the Program are in place and functioning.

### Integrity issues within the Croatian health sector supported through the Program

The NHCS itself admits that health sector is very prone to corruption, and that Croatia is not an exception to it. A long waiting lists and lack of transparency in their creation and functioning, lack of clinical protocols and care pathways, lack of quality standards, monitoring and control within the system, all of these create environment which allows corruptive behavior. Consequently, the Strategy among the priority measures also includes Combating the corruption and non-formal payments in the health sector.

The ministry has established so called White Phone – a free phone service at which users / patients can report their complaints on the work of the medical staff within the sector, or any other complaints regarding their inability to realize their rights on medical services. Through the established service users are informed about their rights and about the next steps through which they should be able to realize them. If the complaints cannot be solved immediately, they are recorded and patient is informed in writing on the solution of the reported problem. Received complaints can also trigger some further investigative or even corrective action within the system.

In average, around 900 complaints are received monthly, out of which ¼ are complaints related to unprofessional behavior of the medical staff (long waiting, unkindness, inability to get information); 1/3 are related to issues with the health insurance; 10% are related to waiting lists and e-appointments for various medical treatments; while the rest are questions related to addresses, working hours, contacts in various medical institutions. Complaints related to wrong medical treatment are relatively rare.

The service has been criticized by the representative of the Croatian Association for the Promotion of the Patient’s Rights for being more complaints collecting and recording mechanism than operative in assisting patients in solving their problems.

More specifically, regarding the expected impacts of the PfR on the integrity within the Croatian health sector, it is clear that the Program whose focus is on improving systems efficiency through better management, structure, organization and control directly contributes to creation of the working environment which leaves less space for corruptive behavior.

## Risk Screening Form: the result of the initial phase of the ESSA process

|  |
| --- |
| **1. Associated or Likely Social and Environmental Effects***(This section describes the potential benefits, impacts and risks that are likely to be associated with the Program.)* |
| **1.1. ENVIRONMENTAL** |  |  |
| **RISKS and/or OPPORTUNITIES TO ENHANCE BENEFITS** | **ASSESSMENT** | **POSSIBLE MITIGATION MEASURES (SYSTEMS CAPACITY BUILDING, ETC.)** |
| Environmental risks could be related to one of the TWO MAIN ENVIRONMENTAL ASPECTS OF THE CROATIAN HEALTHCARE SYSTEM **The first one** is the system as resources- and energy- consumer and environment polluter, which includes risks related to the following issues:* Waste generation (including hazardous waste: infectious, chemical, toxic, drugs)
* Radiation safety within medical facilities and radioactive waste
* Emission in air, waste water
* Energy (in)efficiency

**The second** is that some elements of the system play important role in the overall national environmental protection system, within the area of Environmental Health, which includes: water, air, soil quality; food, chemicals, common use items safety; noise protection, protection from ionizing and nonionizing radiation. In regard to this, risks are related to the possibility that Program will negatively impact effectiveness and efficiency of the relevant elements within the system, primarily: * MoH’s Directorate for sanitary inspection; and
* Health Ecology Service within the Croatian National Institute of Public Health and network of Institutes at regional / county level.
 | Foreseen Program’s activities have neither negative nor positive environmental impacts. Namely, regarding negative impacts related to the first listed aspect, the whole focus of the Program on improving quality and efficiency through improved management, reorganization, modernization, performance monitoring and control, as a side effect, very likely decreases probability of environmental misbehavior within the system. This said, it should be kept on mind that changes in the system should be properly prepared (i.e. in detail analyzed, planned, staff and management prepared, simulated, piloted), as otherwise reform could result only in deterioration of the current procedures, without replacing them with effective substitutes (e.g. ineffective centralization of procurement causing delays and insufficient quality of acquired goods and services, having negative consequences on the system’s environmental performance). Regarding the second listed aspect, there are no Program’s negative impacts as relevant mentioned elements within the systems are not targeted by the Program at all. On the other side, regarding positive impacts, although Program contributes to creation of the context in which measures leading to positive environmental impacts are more probable, environmental measures and targets that would imply them are not explicitly mentioned in the Program, which – taking into consideration relatively weak reform management capacity within the system, and tremendous challenges of foreseen reforms – makes them very improbable. Implemented environmental screening of the Croatian HealthCare system against set of standard HealthCare specific environmental themes has shown that there are measures that should be considered for inclusion into the Program, based on one of the following three criteria: 1. Measures that are greening foreseen Program’s measures, thus securing that there will be no missed opportunities for win-win outcomes, in sense of achieving both desired initial goal and potential environmental goals as co-benefit
2. Measures addressing environmental issues whose seriousness requires urgent intervention;
3. “low hanging fruits” – i.e. measures with significant payback on relatively small invested resources
 | Candidate measures that should be further investigated through more detailed assessment of the relevant problem context, associated management systems and their capacities **(in the foreseen subsequent phases of the Program related ESSA process)**, and then – based on the findings – considered for inclusion into the Program includes: * Preparation and implementation of project improving Energy Efficiency of the medical facilities, co-financed from EU structural funds (these could include more comprehensive set of measures dealing with increased resource-efficiency, including Green building design; using of Renewable Energy Resources; Water conservation measures) The system has required capacity – i.e. sufficient human resources within the medical facilities’ technical services – however, better organization and some well-targeted TA is required, with the Ministry as an coordinator and champion of the process. (A/C type of measure)
* Initiation of Green Public Procurement practice (A/C type of measure)
* A fresh look on the possibility to improve food management within the medical facilities (minimization of ecological footprint with co-benefit in improved quality and health impacts of food served, through green procurement of the fresh, seasonal and organic food; reduction of waste)
* Medical waste minimization through improved waste management within the hospital (staff education and advances in selective waste collection).
* Establishment of Environmental Management Systems within the medical facility. This could connect and increase efficiency and effectiveness of the above listed individual environment-related measures within the medical facilities
* Preparation and implementation of projects improving radiation safety within medical facilities (B/C type)
* Secured sufficient capacity of the Sanitary Inspection for implementation of all requirements of the relevant EU legislation
* Improved cooperation among relevant Ministries (including HealthCare, Environment Protection, Agriculture) related to the subject of Environmental Health
* Improved efficiency and effectiveness of the existing Environmental Health laboratories (primarily reorganization and accreditation processes).
 |
| **1.2. SOCIAL** |  |  |
| **RISKS and/or OPPORTUNITIES TO ENHANCE BENEFITS** | **ASSESSMENT** | **POSSIBLE MITIGATION MEASURES (SYSTEMS CAPACITY BUILDING, ETC.)** |
| Social risks / opportunities to enhance benefits are related to the following four main areas: * Internal and external opposition to the reforms – i.e. structural and procedural changes in the Croatian HealthCare sector;
* Social equity issues, which include various potential, already existing disparities in access to quality HealthCare among Croatian regions, rural and urban areas, rich and poor, etc.
* Social accountability issues, which include primarily patients ability to influence HealthCare policies and system by feedback, participation in decision making, etc.
* Impacts on employees within the system, both medical and non-medical
 | The Program foresees system changes and upgrades in both the system’s organization (primarily reorganization of the health facility network aiming for higher efficiency and quality of services for patients) and the ways in which the HealthCare services are provided (e.g. quality monitoring and control, defined care path protocols and procedures, centralized procurement …).The health system has been subject to a number of reforms, seeking to promote efficiencies and secure adequate health protection. Cost containment measures have only been partly successful, and have shifted a proportion of costs on to users. Negative perception and reactions based on that impacts are the major risk. Also Program could be perceived by interested public as reduction of their rights in the sense of decreased accessibility of health services in the region (county) where rationalization will happen. The social impact could be recognized more serious as there are big regional differences and regional disproportions concerning development and employment as key social determinants of health. Transparency in the high-level decision making in the HealthCare system is area which continuously has to be improved. Some initiatives are taken to improve transparency in the system, but much improvement is still needed in this area. Since 2010 patients’ representatives are members of county health councils. Since 2012, some positive changes have implemented: strategy 2012-2020 was developed through series of consultations and public debates with declared and implemented participatory approach. Also some negative impacts of PforR could be communicated or mitigate during regularly weekly meetings between patients’ associations and Minister of health. Due to existing lack of medical professionals and uneven distribution the main Program impacts on medical staff could be changed working conditions, request for new competences, need for task-shifting or skill-mix and model based on workforce mobility. Program activities, primarily planned rationalization of the health facility network and outsourcing could have negative social effects in terms of potential retrenchment /lay-offs of non-medical staff | Although all these changes are overall in favor of both patients and the employees within the system, as changes aims for higher overall quality for the patients and better organized and managed system for the employees, all changes of these type always have opposition, as overall improvements specific mitigation measures have to be prepared.Effective change management, which include also effective communication of the planned reforms measures and its’ overall advantages and fairness, will be of critical importance for the Program success, i.e. for the success of the reforms supported by the Program. Efficient communication program to all key stakeholders (on national and local level), both those inside the system, and citizens is necessary. This communication program has to emphasize that the prime objective of the reform is not reduction of the system but allocation toward more efficient HealthCare, increased quality and equity. Also, program on long term perspective has to explain and argument that existing model of HealthCare does not provide services (in quantity and quality) in relation to present high expenditures and expected outcomes.  |
| **2. Environmental and Social Context***(This section describes the geographical coverage and scope of the Program and environmental and social conditions in the Program area that may have significance for Program design and Implementation.)* |
| 2.1 ENVIRONMENTAL CONTEXT |
| During the EU accession process, Croatia adopted environmental legislation harmonized with EU acquis, which has very high environmental standards. Environmental management capacities also have strengthened considerably, although a lot yet has to be done, including primarily significant improvements in current waste management practices; but also related to energy efficiency; use of renewable sources of energy; systematic monitoring of state of the environment; environment and sustainability-related education and awareness raising of the general population, businesses and public sector managers. General environmental awareness, responsibility and behavior of the population is much lower than in some EU leaders in this area. E.g. selective waste collection, which as an daily routine is good indicator of environmental “culture”, is at the very beginning in Croatia. More specifically, regarding the area of Environmental Health, the fact that there are no frequent accidents involving environmental health risks indicates that systems are in general reasonably effective. However, there is a lot of space for improvements in efficiency, through better organization and management, primarily better inter-sectoral / inter-Ministerial cooperation than exists at the moment.  |
| 2.2. SOCIAL CONTEXT |
| The NHCS 2012-2020 addressed some key social determinants relevant for health and HealthCare: According to the GDP per capita, Croatia falls back significantly behind the EU member states. It is important to notice regional disproportions of Croatia concerning development. The least developed counties are the counties of the Central and Eastern Croatia, and by far the highest GDP per capita is in the City of Zagreb. Average unemployment rates in Croatia are higher than in EU 27, EU 15 or EU 12. The most unemployed people in February 2012 were without education, with elementary school or high school qualifications. The unemployment rate among the young in 2011 was between 30 and 40%. Regional disproportions in Croatia also exist in unemployment rates, and most counties in 2010 had higher unemployment rates than the Croatian average.“National health surveys showed barriers to an equitable HealthCare utilization among different population groups with various economic status and living in different regions of the country, controlling for HealthCare needs. Respondents living in suburban and rural settlements had to travel longer distances to access HealthCare facilities and had therefore higher expenses Respondents living in urban areas reported long waiting time and negative attitude of the health personnel as the main barriers to care. Among problems of vulnerable groups NHCS 2012-2020 particularly emphasized:* “greatest contribution to the disease burden of the elderly people are chronic diseases. Share of hospitalized people at the age of 65 and over amounts to 30% of the total number of people treated at hospitals in Croatia.
* „there are more than 519,000 persons with disability in Croatia, which is about 12% of the total population. The most common conditions causing disability are impairments of the locomotor system, mental disorders, impairments of other organs and body systems and impairments of central nervous system.“

Although transparency in the high-level decision making in the HealthCare system is area which continuously has to be improved, current situation presents well developed communication and cooperation with patients’' and citizens representatives. Apart of well-defined legislation there are more positive examples are: participatory approach during Strategy 2012-2020 development process, regular meetings with patients' representatives in the MoH, role of the patients' representatives in the county health councils, free call service /Bijeli telefon/ which enables patients to present their complaints on health workers or any other complaint in relation to realizing their right to HealthCare.It is important to notice ongoing strike organized by Croatian medical doctors’ trade union. Strike was organized by and Medical doctors’ and Nurses’ trade unions as demand of hospital workers for restoration of previous benefits scrapped earlier this year. Main problem were overtime payment and for on call duties. After successfully completed negotiations, Nurses’ trade union stopped the strike. Negotiation between Croatian medical doctors’ trade union and Government are still ongoing /written on November 3, 2013/ |
| **3. Program Strategy and Sustainability***(This section situates the Program, and its environmental and social management systems, within the country’s broader development strategy, with particular emphasis on identification of factors that may impede successful Program management over time. Specific questions that should be addressed include: Strategic context: What is the long-term vision of this Program in relation to the country’s development strategy?; Does it include explicit environmental and social management objectives? Do Program activities commit, constrain or alter decisions of future generations? Are there any potential roadblocks to ensuring the environmental and social sustainability of the Program after implementation?)* |
| Environmental considerations: * Program is fully in line with the national development priorities. It supports structural reforms in one of the most complex area which currently present significant financial burden on the state budget. The reforms within the HealthCare system supported by the Program are urgently needed necessities.
* Current version of the Program does not have explicit environmental management objectives. It is suggested to add some environment-related DLIs, as otherwise, there is a high probability that environment-related agenda will be completely forgotten because of the objectively more significant, core business related priorities. An addition of some environment-related DLIs would serve as reminder. Indicators should be reasonably easy to achieve: e.g. number of Energy Efficiency projects prepared for application for co-financing from EU funds; Percentage of medical facilities with fully established medical waste management system in line with the legal requirements and some standard waste management best practice criteria.
* Amending the Program with the components that would contribute to the “greening” of the Croatian HealthCare sector would have positive environment-related effects not only within the HealthCare system, but also outside of the system. Concretely: a HealthCare system as a significant consumer has relatively significant market leverage that can be used for greening of the general markets; as a HealthCare system is a big employer, positive environmental changes within the system impact environmental behavior of the significant number of people / families; as significant sector within the public sector, it would show a way for other sectors to follow.
* With such “green amendments, the Program would become also a significant initiative on environment-related development agenda in Croatia (in areas of e.g. waste management, Energy efficiency, Renewable sources of energy).
 |
| Social considerations:* Program is fully in line with the national development priorities. It supports structural reforms in one of the most complex area which currently present significant financial burden on the state budget. The reforms within the HealthCare system supported by the Program are urgently needed necessities.
* Program supports changes that should result with more efficient, higher quality HealthCare services, better suited to the needs of patients. Having needs of the patients as a cornerstone for planning of the system is positive, both from the point of issues of social equity and social accountability. In order for this to happen, the Hospital Master Plan under preparation should recognize and reflect specific needs of the regions, significance of the HealthCare system in certain region as employer, a factor of regional development policy, prerequisite for development of certain types of economic activities (medical tourism, general tourism, …)
* Reorganization of the system supported by the Program is opportunity to improve efficiency and effectiveness of human resources within the system. In order for this to happen, a Strategic plan for human resources in HealthCare should be prepared during implementation of the Program.
 |
| **4. Institutional Complexity and Capacity***(This section describes organizational, administrative and regulatory structures and practices, as they relate to environmental and social assessment, planning and management. Specific questions that should be addressed include: Does the Program involve multiple jurisdictions or implementing partners?; Capacity or commitment of counterpart to implement regulations and procedures?; Is there a track record of commitment and implementation experience on environment and social aspects?; Are there any known institutional barriers that would prevent the implementation of this Program? Is there sufficient institutional capacity to address the environmental and social impacts of this Program?.)* |
| Environmental considerations* The main challenges in successful fulfillment of the potential environment related objectives of the Program (the most realistic are those related to Energy efficiency in the sector, and medical waste management) are organizational. A better cooperation between central authorities and individual medical facilities, with clearly defined roles and duties, is commonly the main barrier for realization of otherwise easy reachable goals. As the Program foresees more centralized management in other activities (e.g. financial consolidation, centralized public procurement), it will create favorable settings for efficient implementation of suggested environment related activities.
* Regarding the trends and relevant track record, the general trends with environmental performance of the Croatian HealthCare system are positive. However, it can be further accelerated.
 |
| Social considerationsThere are several acts which regulate the work of the HealthCare professionals, health services.and HealthCare reform. The NHCS 2012-2020 addressed the equity in access to funds for maintaining or improving health, fairness in distribution of such funds and solidarity among social groups and generations as fundamental values and principles. These principles are also set by the acts on HealthCare and mandatory health insurance. The Croatian Health Insurance Fund (CHIF) uses the National Health Plan and the Plan and Program of Health Care Measures to prepare its annual plans for the provision of HealthCare services. Based on these annual plans, it passes regulations on health insurance entitlements and signs contracts with HealthCare providers. Providers contracted by the CHIF operate within the National Health Care Network. Thus all planned reforms could be implemented through already existing legislation or procedures. Some constrains during PforR implementation could appear as there are recognized some important weaknesses in the HealthCare system (in the Strategy 2012-2020):* Health needs assessment is not properly developed in Croatia
* Lack of understanding and rejecting the need for reform measures in the Croatian society.
* Undermined trust in public sector institutions as a result of perceived corruption.
* Regionally uneven economic strength and ability to finance HealthCare.
 |
| **5. Reputational and Political Risk Context***(This section describes environmental and social issues, trends or other factors that may cause the program, the country, or the Bank to be exposed to significant reputational or political risk. More specifically, questions that should be addressed include: Are there any Potential governance or corruption issues? Are there any political risks associated with this sector or proposed Program? Is the sector or Program known to be controversial? )* |
| General considerationsHealthCare sector is one of the toughest sectors requiring urgent structural reforms. The task is huge and complex. Consequently, there are no straightforward non-controversial solutions. However, it is clear that reforms are necessary, and that it should focus on exactly the two issues emphasized in the Program’s title: Quality and Efficiency of health services.  |
| Environmental considerations* As there are no major environment related risks associated to the Program, there are also no environment related reputational and political risks associated to the Program.
* If amended with the “greening activities”, the Program can have significant positive role in environment-related processes in Croatia.
 |
| Social considerations* The ongoing strike clearly indicates that no reform of the Croatian health sector will pass without strong opposition and long negotiations. The most that can be done on the side of Program, as a measure that both improves chances for successful implementation and mitigates reputational risks in its implementation is clear and effective communication of the Program’s objectives. Clear arguments explicitly addressing all controversial issues related to the identified areas of social equity and employees’ rights have to be communicated. The Program implemented in this manner will itself present a new contribution to socially accountable HealthCare system in Croatia.
 |
| Integrity, Fraud & Corruption considerations* Recent developments in anticorruption activities in Croatia (former high government officials prosecuted at the Courts, etc), as well as established system of public procurement in line with EU standards can arguably serve as guarantee that governance and corruption issue risks associated with Program are reasonably low.
 |
| **6. Overall Assessment**:*(This section describes the overall risk profile for the Program, based on the team’s subjective weighting and aggregation of all factors identified above. More specifically, the section should assess if the proposed Program suitable for PforR or would it be better suited to a specific investment loan? Environmental and social risk factors should be summarized separately).* |
| General considerationsThe Program is addressing a tough issue of reform of the system which is currently neither sustainable, nor offering high quality services, nor staffed with the satisfied workforce. Ongoing strike, huge accumulated and continuously further generated financial deficits, long and longer waiting lists for certain HealthCare services with significant disparities in accessibility in reality – all these confirm the graveness of the present situation. Consequently, there is no easy and straightforward solution for successful Program implementation. However, there are also two reassuring facts. First, the Program is supporting implementation of the Strategy that has been prepared and adopted through wide consultation with all key stakeholders, which means that there is consensus of the key stakeholders regarding the Programs objectives and approaches. The second, as suggested already in the Program’s title, the Program is targeting inefficiency within the system, in order to IMPROVE overall quality. This aspect of the Program should be emphasized continuously, as it makes it much more acceptable than would be a case it the Program is focused on savings within the system based on the reduction of the services provided. Because of the complexity of the task addressed by the Program, the PforR format is no doubt the best suited for the task, as it gives the Program level of flexibility required for successful implementation of the Program which will include lot of negotiations among the key stakeholders.  |
| Environmental aspects specific considerationsThere are no Program related environmental risks. However, the Program presents a great opportunity for initiation of more systematic “greening” of the HealthCare sector in Croatia, especially related to the energy efficiency, water conservation, waste management practices, initiation of green purchasing practices.  |
| Social aspects specific considerationsThe Program is opportunity to explicitly readdress important issue of social equity in HealthCare, i.e. existing and growing disparities in accessibility of quality HealthCare service among different regions, rich and poor, urban and rural, general population and especially vulnerable groups. The foreseen reorganization activities are opportunity for establishment of the innovative models of HealthCare that will better serve needs of currently the most vulnerable groups (including older, low income population in more distant, rural areas, poorly connected by public transport network with regional centers). The foreseen reorganization aiming for higher efficiency, improved control and more result-based payments is an opportunity for establishment of the more transparent and motivating working surroundings for all employees. The implementation of the Program addressing some of the toughest challenges of the Croatian society, which will necessarily include a lot of communication and negotiation among the key stakeholders, will itself contribute to the higher social accountability of the system.  |

1. HealthCare sector in Croatia consumes above 18% of the state budget. In addition, Croatian government paid in 2013 around 660mil€ (which is around 4% of the Croatian state budget) on account of accumulated sector's debts. Trends unsustainability is further illustrated by the facts that the sector’s expenditures have grown by 8% annual rate in recent years. [↑](#footnote-ref-1)
2. Following finalization of the Hospital Master Plan, the Ministry of Health will identify two or more potential hospital reshaping schemes in agreement with the Bank and implement at least two of the agreed subprojects to their full functionality [↑](#footnote-ref-2)
3. Includes: elaboration and mandatory implementation of a unique system of clinical quality indicators; support to HealthCare providers in the process of establishing a system of HealthCare quality assurance and improvement, including establishment of a special unit for assuring and improving HealthCare protection to HealthCare providers who are required to do so and the constituting of the internal supervision committee. [↑](#footnote-ref-3)
4. Includes the elaboration of accreditation standards, accreditation manual, accreditation rulebook, HealthCare provider self-assessment manual, rulebook on the publication of self-assessment results and accreditation assessment, accreditation registry and accreditation database. [↑](#footnote-ref-4)
5. Croatian Environmental Protection Act (OG 80/13, Article 63) does not require SEA for Strategies, Programs and Plans related to the HealthCare sector [↑](#footnote-ref-5)
6. Environmental Health was defined by the First European Conference on the Environment and Health (WHO, 1989) as a branch of public health dealing with those aspects of human health and disease directly or indirectly caused by biological, chemical, physical and psychosocial environmental factors. The area of environmental health includes subjects of water and air quality, food safety, common use items safety, chemical safety, safety related to biocides and other toxic materials, protection from noise pollution, protection from ionizing and nonionizing radiation [↑](#footnote-ref-6)
7. According the Ordinance on Medical Waste Management, “ a large source” is every source generating more than 200kg of hazardous medical waste [↑](#footnote-ref-7)
8. Complete list can be found on <http://www.zdravlje.hr/ministarstvo/djelokrug/uprava_za_sanitarnu_inspekciju> [↑](#footnote-ref-8)
9. Ministry of youth and social policy is responsible for providing social welfare services, but social impact related to the health or HealthCare are mainly responsibility of the Ministry of health. [↑](#footnote-ref-9)
10. Following the provisions of the 2004 Act, commissions for the Protection of Patients’ Rights have been founded at both the county (in every county) and national level (at the Ministry of Health). The five-member County Commissions, with representatives of patients, NGOs and experts in the field of the protection of patients’ rights, monitor violations of individual patients’ rights and propose measures to protect and promote patients’ rights in the area of the county, inform the Ministry of Health Commission of cases of serious violations of patients’ rights and submit annual reports on its work to the County Assembly. The seven-member Ministry of Health Commission (three representatives of associations working to protect patients’ rights, one representative of the media, three representatives of the Ministry of Health) monitors the implementation of the realization of patients’ rights pursuant to this Act, has oversight over the County Commissions, and promotes patients’ rights in Croatia, including via cooperation with international bodies. [↑](#footnote-ref-10)
11. Local planning and patients’ accountability is addressed precisely in the chapter 10 of the Act on HealthCare from 2009: *In order to realize its rights, obligations, tasks and objectives in the area of healthcare on its territory, a unit of district (regional) self-government shall establish a health council The composition of the health council shall ensure the participation of representatives of local self-government, healthcare industry chambers, professional associations, associations for the protection of patients’ rights and the trade-unions and employers in the healthcare industry in the process of planning and evaluating the healthcare provided on the territory of the unit of district (regional) self-government*. In order to realize the tasks stipulated in Par. 3 of this Article, the health council shall give its opinion on the draft plan of healthcare for the area of a unit of district (regional) self-government and shall propose measures to ensure the accessibility and quality of healthcare in the unit of regional (regional) self-government. [↑](#footnote-ref-11)
12. Existing grievance channels are used by Croatian patients to make their cases heard and addressed. On average, around 900 complaints are received monthly, out of which 1/4 are complaints related to unprofessional behavior of the medical staff (long waiting, unkindness, inability to get information); 1/3 are related to issues with the health insurance; 10% are related to waiting lists and e-appointments for various medical treatments; while the rest are questions related to administrative issues (addresses, working hours, contacts in various medical institutions). Complaints related to wrong medical treatment are relatively rare. [↑](#footnote-ref-12)
13. **Analysis of the Severance Pay Scheme in the Republic of Croatia: current arrangements and changes to be considered /** World Bank report prepared at the request of the Ministry of Labor and Pension System of the Republic of Croatia

Severance pay, as regulated by the Labor Act, if the worker has been in an uninterrupted employment relationship with the same employer for longer than two years, is calculated as the amount of one third of the salary for each complete year of employment with that employer, and no more than six salaries, but may also be regulated more favorably by a collective agreement, work regulation or an individual employment contract. Mainly these more favorable amounts relate to workers in the public sector. [↑](#footnote-ref-13)
14. due mainly to increased cost of energy, the amount more than doubled since the year 2000 – i.e., it was 210mil HRK in 2000., 300mil HRK in 2006; 352 in 2009, 405 in 2010 [↑](#footnote-ref-14)
15. altogether 750.000m2 of developed building surface; 327 objects; remote monitoring of the energy and water consumption in 16 hospitals [↑](#footnote-ref-15)
16. 2337 employees attended the basic informative WS Green office; 4 employees completed training for the Green office coordinator; 9 employees for Energy Efficiency advisors; 36 training for the person responsible for energy management in the buildings; 155 for responsible persons; 326 for technical personnel; 207 for operation of the established information system on energy management [↑](#footnote-ref-16)
17. helpdesk-reach@miz.hr; <http://echa.europa.eu/croatia> [↑](#footnote-ref-17)
18. compares 34 European health care systems [↑](#footnote-ref-18)