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Report No. T7644-IQ

THE MINISTRY OF HEALTH OF THE REPUBLIC OF IRAQ

PROPOSED TRUST FUND GRANT

OF US$25.0 MILLION

FOR AN

EMERGENCY HEALTH REHABILITATION PROJECT

TECHNICAL ANNEX

November 30, 2004

Human Development Sector
Middle East and North Africa Region

CURRENCY EQUIVALENT

(Exchange Rate Effective November 30, 2004)
Currency Unit = US$
US$ 1 = Iraqi Dinar 1,465

FISCAL YEAR

January to December

ABBREVIATIONS AND ACRONYMS

CPA	Coalition Provisional Authority
CQ	Selection based on Consultants' Qualifications
ECOP	Environmental Codes of Practice
EHRP	Emergency Health Rehabilitation Project
ESSAF	Environmental and Social Screening and Assessment Framework
FMR	Financial Monitoring Report
GDP	Gross Domestic Product
IBRD	International Bank for Reconstruction and Development
ICB	International Competitive Bidding
IDA	International Development Association
IRFFI	International Reconstruction Fund Facility for Iraq
ITF	World Bank Iraq Trust Fund
MA	Monitoring Agent
MOF	Ministry of Finance
MOH	Ministry of Health
MOPDC	Ministry of Planning and Development Cooperation
NCB	National Competitive Bidding
OFFP	Oil for Food Programme
PIM	Project Implementation Manual
PFS	Project Financial Statements
PMO	United States Program Management Office
PMT	Project Management Team
PP	Procurement Plan
QCBS	Quality- and Cost-Based Selection
SBD	Standard Bidding Document
SOE	Statement of Expenses
TA	Technical Assistance
TOR	Terms of Reference
UNDB	United Nations Developmental Business
UNDG	United Nations Development Group
UNICEF	United Nations Children's Fund
USAID	United States Agency for International Development
WHO	World Health Organization

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EMERGENCY HEALTH REHABILITATION PROJECT

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GRANT AND PROJECT SUMMARY

Grant Recipient:	Ministry of Health, Republic of Iraq
Beneficiary:	Ministry of Health
Implementing Agency:	Ministry of Health
Loan/Credit/Grant:	Grant
Amount & Terms:	US$25.0 million on grant terms
Objectives & Description:	The objective of the Project is to improve access to quality emergency services in selected health facilities to serve the urgent needs of the Iraqi population. This objective would be achieved through: (i) rehabilitation of priority emergency services, including emergency obstetric care in 12 selected hospitals, and the urgent provision of basic medical and laboratory equipment to the selected rehabilitated hospitals; (ii) the provision of a 3 to 6 month supply of up to 37 essential emergency drugs to be used at emergency facilities rehabilitated through this project; (iii) continued support to strengthening of planning and management capacity within the central and Governorate health administrations; and (iv) support to project management.
Technical Annex:	This Project has been prepared in accordance with Emergency Recovery Assistance procedures (Operational Policy 8.50). There is no Project Appraisal Document for this Project.
Disbursement:	The grant is expected to be fully disbursed by December 31, 2006.
Closing Date:	December 31, 2006
Project ID Number:	P091305
Map No.	IBRD 32954

MINISTRY OF HEALTH OF THE REPUBLIC OF IRAQ

EMERGENCY HEALTH REHABILITATION PROJECT

TECHNICAL ANNEX

A. BACKGROUND AND STRATEGY

Country Background

1. Abundant natural and human resources enabled Iraq to attain the status of a middle-income country in the 1970s. The country developed good infrastructure and well-performing healthcare and education systems, widely regarded as the best in the Middle East. Income per capita rose to over US$3,600 in the early 1980s. Since that time, successive wars and a repressive, state-dominated economic system have stifled growth and development and debilitated basic infrastructure and social services. International trade sanctions imposed in 1991 took a toll on the economy. Despite the country's rich resource endowment, Iraq's human development indicators are now among the lowest in the region and income per capita dropped to about US$770 by 2001, with continued decline thereafter. Although there is a paucity of reliable economic data, 2003 GDP is estimated at about US$12.1 billion, or about US$446 per person, assuming a population of about 27.1 million.

Current Challenges and International Response

2. Following the recent war, Iraq faces enormous challenges and the situation is still evolving. In addition to a complicated political transition, Iraq needs to rebuild social cohesion and implement an economic transition from a centrally planned economy to a diversified market economy. It will be particularly important to mitigate the temporary adverse effect of reforms on the poor and vulnerable.

3. A Needs Assessment covering fourteen sectors, prepared jointly in 2003 by the World Bank and United Nations Development Group (UNDG), and with the participation of the International Monetary Fund, estimated that Iraq requires about US$36.0 billion for reconstruction over four years, and the then Coalition Provisional Authority (CPA) estimated separately that Iraq requires about US$19.0 billion over four years for security and oil production, areas otherwise not covered by the Needs Assessment.

4. At an International Donors' Conference for Iraq in Madrid on October 23-24, 2003, donors expressed support for the Needs Assessment and pledged about US$32.0 billion for the four-year period covered by the Needs Assessment. Donors also asked the World Bank and UNDG to set up an International Reconstruction Fund Facility for Iraq (IRFFI) to ensure swift, flexible, and coordinated donor financing for priority investments consistent with the Needs Assessment. IRFFI consists of two trust funds—a World Bank Iraq Trust Fund and a UNDG Trust Fund—each with its own internal governance procedures and a management structure that ensures close coordination. Information on current and planned international donor health activities in Iraq can be found in Annex 10.

Health Sector

5. Once considered one of the best in the region, the Iraqi health system has suffered the consequences of three major wars, inappropriate policies, poor management and the absence of adequate resource allocation. During the 1980s, Iraq's health sector consisted of a highly advanced curative system, with little, if any, public health approaches in place. During the 1990s, funds available for health were reduced by 90% and health outcomes became among the poorest in the region and well below levels found in countries of comparable income. According to the 2003 UNICEF/WHO Health and Nutrition Watching Brief, Iraq has the region's second-highest infant mortality (83/1,000 live births in 2002) and under-five mortality rates (117/1,000 in 2001), a stark reversal from the improvements in the late 1970s and early 1980s. During the 1990s, maternal mortality grew close to three-fold, with an estimated 30% of women giving birth without a qualified health worker in attendance.

6. Prior to 1990, Iraq was entering its epidemiological transition from infectious to non-communicable diseases, but has since been suffering from a double burden in its disease profile. Iraq is experiencing increases in non-communicable disease morbidity and mortality, while at the same time facing increases in the incidence of communicable diseases. The Ministry of Health (MOH) has identified the following as contributing factors to the deteriorating health status: poor investment in the health sector, poorly maintained health infrastructure, inappropriate management of the health sector, poor sanitation and water supply, unsafe food storage, and unhealthy lifestyles and behaviors.

7. Currently, the Iraqi health system is suffering from institutional inefficiencies due to inadequate resource allocation (financial and workforce) and poor management. The health system's physical infrastructure suffers from severe deterioration due to neglect over time and consequences from last year's war and looting, whereby most of the health infrastructure remains in poor condition and is critically lacking essential equipment.

8. The Iraq Health Sector Situation and Strategy Options Assessment[1] reports that less than one-third of Iraq's hospitals and health centers have adequate facilities to provide emergency obstetric care. For example, it is estimated that 65% of births occur outside of health facilities, and the proportion of deliveries without trained assistance has increased since the 1990s to 30% in urban areas and 40% in rural areas at the present time. Approximately 15-20% of deliveries classify as high-risk and require emergency obstetric support. Given these obstacles, the maternal mortality ratio in Iraq is extremely high and is estimated to be 300 per 100,000 live births. The needs are urgent for improved emergency obstetric care, given the bleak maternal mortality indicators. It is therefore imperative to upgrade key facilities with the essential emergency equipment, drugs, training and referral capacity to provide adequate emergency obstetric care to the population.

9. The 2003 UN/WB Joint Iraq Needs Assessment identified US$1.6 billion of needs for the health sector in the next four years, focusing on: (i) restoration of effective control and

[1] Drafted in October 2003 by the Ministry of Health, the Coalition Provisional Authority, the UN Development Group and the World Bank.

implementation for public health programs; (ii) equitable access and focus on women, children and other vulnerable groups; (iii) rehabilitation of essential infrastructure and provision of equipment; (iv) resolution of imbalances in the distribution and skill-mix of health professionals; and (v) initiation of a national health plan. More recently, the Ministry of Health has calculated estimates for basic rehabilitation of the health sector to be at least US$4.0 billion over the next four years.

10. In a recent meeting in July 2004 between the senior staff of the Ministry of Health and the donor community (World Bank, UN agencies, and some bilaterals), the following overall priority areas were identified by the Ministry: (i) pharmaceuticals, vaccines and medical equipment; (ii) emergency medical services; (iii) essential infrastructure rehabilitation; (iv) health information system; (v) communicable disease control and surveillance; (vi) communication equipment (hardware); (vii) capacity building and human resources development; (viii) communication and health promotion strategy for the health sector; (ix) health management; (x) primary health care; (xi) food safety; and (xii) donor coordination.

11. In view of the health situation in Iraq, where infant and maternal mortality rates are extremely high and conflict-related injuries are very common, and taking into account the priority areas identified by the MOH and the donor community, this Project will meet several of the urgent needs listed above in response to the current post-conflict situation. Of the twelve aforementioned priority areas, this Project is designed to address five in a manner involving technical soundness, quick implementation, proper procurement and financial management: (i) pharmaceuticals and medical equipment; (ii) emergency medical services; (iii) essential infrastructure rehabilitation; (iv) capacity building and human resources development; and (v) health management.

Existing Health Infrastructure

12. Existing Hospitals. There are more than 240 hospitals in Iraq. Of these, 172 are government-owned and operated, of which approximately 12% were partially damaged and/or looted in 2003. It is widely known that most hospitals have suffered from neglect over the last two decades, exacerbated by the aftermath of the 2003 war. There has been a systematic lack of maintenance of the physical infrastructure, essential drugs and equipment, and looting has worsened the conditions in most facilities. In particular, emergency medical services at Iraqi hospitals are in a severely inadequate state, where emergency and critical care principles are lacking, and in many cases, even aseptic management is clearly absent. Shortages of essential and emergency medicines have been recurrent within the Iraqi hospital system.

13. Primary Health Care Facilities. From a total of 1,285 primary health care centers (PHCs), at least two-thirds require essential rehabilitation, including access to safe water, electricity, sanitation and medical waste treatment facilities. Over the last two decades, the MOH has not been able to maintain its facilities adequately and, as a result, they have become dilapidated and dysfunctional. Due to lack of maintenance or loss to post-war looting, absence of existing or functional equipment is widely reported. More than 80% of health centers lack such basic items as stethoscopes, sphygmomanometers, sterilizers and weighing scales.

14. While significant donor commitments have been made towards the construction of new health facilities, no significant commitments have been made to rehabilitate the existing health facilities. Funding from the US Program Management Office (PMO) is planned for a limited number of new health centers (150), but the MOH notes severe delays in its implementation and the number of centers expected to be constructed is not sufficient to meet the current needs. PMO funding is also planned for a new maternity hospital and a new pediatric hospital. The MOH has identified the rehabilitation of selected key hospitals, and primary health care facilities, particularly in rural areas, as an urgent and priority need that would help to improve the quality of and access to basic health services in the shortest period of time.

Existing Human Resource Capacity

15. The MOH capacity to formulate and implement policies, and manage the provision of basic services remains very weak. Empowerment of the Iraqi health system requires more than political will, and skills must be strengthened. Substantial investments are urgently needed to build up a sufficient capacity at the central, Governorate, and district levels. Such training activities include health planning, national health accounts, health policy and health care financing, project management, financial management and procurement (including pharmaceutical procurement).

16. The establishment of an adequate level of managerial capacity has been recognized as critical. Some donors have begun work on such areas as clinical training (WHO and JICA), but the need to strengthen the management capacity at both the central and Governorate levels and support public health training remains largely unmet. Iraq currently has very few, if any, qualified public health specialists and no system is in place to train health staff in this area.

B. BANK RESPONSE AND STRATEGY

17. In January 2004, the World Bank's Board of Executive Directors discussed an Interim Strategy Note of the World Bank Group for Iraq and authorized the Bank to act as administrator of the World Bank Iraq Trust Fund.

18. The World Bank Group's interim strategy, which initially covered the period February-October 2004 is still in effect, and the Bank's work remains within the framework of the strategy. The strategy focuses on: (i) building Iraqi capacity which is urgently needed for the reconstruction program; (ii) preparing and implementing emergency operations to generate employment and restore essential infrastructure and services; and (iii) laying the foundation for the medium-term program, through studies and policy advice.

19. The strategy relies on the World Bank Iraq Trust Fund (ITF) to finance projects, and on Bank budget for the economic and sector work and policy advice that is needed. The ITF has about US$370 million to cover nine projects. One project has been completed, three are under way, and five are in the final stages of preparation. The interim strategy also includes building blocks of analytical work to support the transition to a diversified market economy and the development of a social protection system. Analytical work has been grouped into three clusters: economic reform and transition, public sector management, and poverty and safety nets; and two

sectors: health and education. A multi-sectoral institutional capacity building program has already commenced.

20. The proposed Project aims to address the most urgent needs of the health sector, stemming from years of neglect, the recent conflict, and dramatic increases in violence in areas that had until recently been relatively untouched. Expected to be implemented within 24 months after Project Effectiveness, the Project will be used to establish a model for planning, procurement and financial management within the health sector. It will also allow for the development of a standardized approach to rehabilitation of health facilities and will constitute the most effective way for the MOH to acquire the capacity it needs to manage longer-term reconstruction and rehabilitation activities.

21. Discussions have been held between the Bank and the Iraqi authorities concerning future support to the health sector, possibly in the form of a three to four year investment project that would follow the initial Grant. In planning the follow-on investment, the MOH will focus on longer-term needs for the sector and will prepare a more comprehensive project. Possible areas identified include: (i) support for the repair and rehabilitation of Primary Health Centers, including provision of basic medical equipment and supplies; (ii) continued support for the repair, rehabilitation and equipping of priority hospital services, such as Emergency Units and Emergency Obstetric Services, building on the results of the first Project; (iii) continued capacity-building and training for MOH staff; (iv) with the involvement of other donors, support to the creation of a School of Public Health, responding to the needs of the country but with the potential to become a regional training institution; (v) assistance in reform of the pharmaceutical sector; and (vi) assistance in the design of health policies and health systems reforms. This follow-on investment would be further elaborated at a later date, based on emerging priorities and the results of the initial Project.

22. Given the situation in the health sector, the Minister of Health has approached the World Bank to request assistance in addressing the most urgent rehabilitation needs to strengthen the Iraqi health system and increase its capacity to alleviate the currently soaring infant and maternal mortality rates. Areas of priority would include:

- Hospital rehabilitation, particularly Emergency Services capabilities and provision of essential emergency equipment and pharmaceuticals
- Capacity-building and training of MOH staff

23. Building on the stated priorities of the MOH, the Bank can play an important role in supporting the rehabilitation of the health sector in Iraq, based on the Bank's comparative advantages, including: (i) applicable experiences from relevant development and post-conflict situations, in particular within the past decade; (ii) "best practice" models that can be applied to the current context; (iii) in-depth knowledge and expertise in health systems development; (iv) extensive experience in helping Governments to work effectively with NGOs; and (v) in its role as financier of last resort, the ability to mobilize additional financing to address the most critical needs for basic health service delivery throughout the country.

24. Lessons from Post-Conflict Experience. Based on the World Bank's recent experience in post-conflict countries such as Afghanistan, East Timor, Bosnia, Algeria, Sierra Leone and Kosovo, a number of important lessons have been learned and introduced into the design of the proposed project. Below are key lessons learned:

- For emergency recovery projects, a simple project design that can be quickly and visibly implemented is most effective.
- The project should be part of a programmatic framework based on needs assessment of the sector and close collaboration with other key donors.
- Support to emergency priorities should be coupled with capacity building for the implementing institutions and entities in order to improve their ability to implement current and consecutive programs.
- In contexts where direct Bank supervision is not possible, adequate training should be provided to local representatives to carry out oversight of the project activities.
- In post-conflict situations where there are numerous donor agencies involved, support should be provided to the MOH in establishing an effective coordinating mechanism. This support could be in the form of technical assistance and training in setting up the mechanism within the framework of the project, as well as through "informal" technical advice from the Bank team itself to the relevant MOH counterparts. In addition, the Bank needs to maintain good and frequent collaboration with development partners.

C. DETAILED PROJECT DESCRIPTION

Project Objectives

25. The principal objective of the Project is to improve access to quality emergency services in selected health facilities to serve the urgent needs of the Iraqi population. This objective would be achieved through: (i) rehabilitation of priority emergency services, including emergency obstetric care in 12 selected hospitals, and the urgent provision of basic medical and laboratory equipment to the selected rehabilitated hospitals; (ii) the provision of a 3 to 6 month supply of up to 37 essential emergency drugs to be used at emergency facilities rehabilitated through this project; (iii) continued support to strengthening of planning and management capacity within the central and Governorate health administrations; and (iv) support to project management. By the end of this project, it is expected that:

- Twelve carefully selected hospitals will have functioning emergency medical services defined by adequate physical infrastructure, essential equipment and drugs, adequate staffing and well-trained emergency teams.

- The Ministry of Health will have strengthened its planning and management capacity at both central and Governorate levels.

Project Description

26. The Project will comprise four components, to be implemented over a period of up to 24 months. It will be fully funded as a Grant under the World Bank Iraq Trust Fund, operating under OP 8.50, Emergency Recovery Assistance. The four components are described below:

Component 1: Rehabilitation of Priority Emergency Services (estimated total cost US$21.4 million)

27. The Project will support the repair, rehabilitation and equipping activities of hospital emergency facilities to restore fully functional emergency services in 12 carefully selected hospitals in 9 Governorates of Iraq. These activities have been identified and prioritized using explicit criteria of need, feasibility and affordability (see Annex 8A). Repairs and rehabilitation will focus on the priority structural, electrical, mechanical and heating/air conditioning systems for: (a) emergency room reception and administrative counter; (b) triage areas; (c) diagnostic services rooms; (d) patient examination areas; (e) patient wards; (f) minor surgery operating theatre; (g) doctors' and nurses' offices and rest areas; (h) nurses' station; (i) emergency drug dispensary; and (j) other support areas (sterilization room, kitchen, restrooms, storage, janitorial space).

28. The Project will also provide the selected facilities with their most urgent needs in diagnostic and therapeutic equipment for emergency services, including specific emergency room equipment. Examples of such equipment selected are: diagnostic equipment, emergency resuscitation equipment, and emergency life support equipment (see Annex 8B for a complete list of specific planned investments).

29. This first phase of the reconstruction effort will concentrate on establishment of a sustainable model for planning, procurement and financial management. It will allow for the development of a standardized approach to the rehabilitation of health facilities and will constitute the most effective way for the MOH to acquire the capacity it needs to manage longer-term reconstruction/rehabilitation activities. The Project will provide financing for the rehabilitation activities, emergency medical equipment and technical assistance for design and supervision of the sites.

Component 2: Provision of Essential Emergency Drugs (estimated total cost US$2.9 million)

30. The Project will support the procurement and distribution of a 3 to 6 month supply of up to 37 essential emergency drugs to be used at the 12 emergency facilities rehabilitated under Component 1. Categories of essential emergency drugs include the following: (i) general anesthetics; (ii) preoperative medication and sedatives; (iii) anti-infective drugs; (iv) cardiovascular drugs; and (v) oral and parenteral solutions. This component will be supported through the provision of pharmaceuticals.

Component 3: Capacity Building and Training (estimated total cost US$1.7 million)

31. The Project will support capacity-building and training activities in Emergency Medical Services for the 12 selected sites. These activities will include: (i) technical training of emergency 5-person teams from each selected site to improve the quality of emergency services; (ii) training in management of emergency services for the hospital directors, emergency chief doctors, head nurses and central-level emergency services planners; and (iii) the development of a comprehensive national plan for strengthening emergency health care services. Additionally, the Project will support training to build the general capacity of MOH in health planning and management at both the central and Governorate levels. A number of short-term training programs will allow for the constitution of a core group of public health and health management specialists. The project will also provide assistance to the MOH in developing a sustainable plan for procurement and distribution of essential emergency drugs. This component will be supported through the provision of technical assistance and training activities.

Component 4: Project Management (estimated total cost US$ 0.9 million)

32. The objective of this component is to ensure effective administration and coordination of the project activities. The Project Management Team (PMT) will comprise 11 staff, five of whom will be local consultants hired under the Project. PMT staff will include: a Project Director to manage and coordinate the implementation of the Project; a Deputy Project Director to be responsible for day-to-day management of the project; a Technical Coordinator to ensure that the technical aspects of the project are being implemented; a Procurement Officer, assisted by three staff, to supervise tendering, purchasing and delivery of works, goods and services; a Financial Officer, assisted by an accountant, to maintain project financial records; an Administrative Secretary, and a Junior Secretary to support the needs of the office. Drivers for the three project vehicles and a messenger will also be hired to support the project.

33. The component will finance: (i) minor refurbishment of the PMT offices agreed between the MOH and the Bank; (ii) adequate office equipment and supplies, and three project vehicles; (iii) technical assistance and training for PMT staff in project management, procurement and financial management; (iv) annual external audit of the project; and (v) operating costs for the PMT, including vehicle and equipment operation and maintenance, communications costs, banking fees, transportation costs, meeting expenses, advertisement fees, representation, and office security arrangements.

D. INSTITUTIONAL ARRANGEMENTS AND PROJECT IMPLEMENTATION

34. The World Bank is supporting the MOH to undertake the emergency rehabilitation of 12 hospital emergency units throughout Iraq, including provision of civil works, medical equipment, priority emergency pharmaceuticals for the 12 sites, and technical assistance and training to strengthen the performance of the emergency teams in these sites, as well as to develop greater capacity within the MOH in the areas of: health systems management and planning, procurement and financial management, and procurement and distribution of drugs.

35. This section describes in detail the implementation of the Emergency Health Rehabilitation Project, which will provide urgent support in the areas described above.

Implementation Arrangements

36. This project is the first in the health sector to be financed from the World Bank Iraq Trust Fund (ITF) within the International Reconstruction Fund Facility for Iraq (IRFFI). The Ministry of Planning and Development Cooperation (MOPDC) is the Government's designated donor coordination agency for Iraq's reconstruction program.

37. A Project Management Team (PMT) will be established to coordinate and manage the Emergency Health Rehabilitation Project (EHRP) under the authority of the Ministry of Health. The PMT will have the responsibility for the day-to-day management, coordination and monitoring of the Project activities. The Project will adopt the management structure put in place for EHRP (Annex 3).

38. The PMT will: (i) coordinate project implementation, and manage the resources of the project; (ii) procure all Bank-financed goods and services under the project; (iii) operate the financial management system according to World Bank requirements; (iv) act as liaison between the technical agencies involved in the project and the World Bank; and (v) carry out, on an annual basis, an independent audit of the project. Specifically, in its management capacity, the PMT will ensure that: (a) the project activities are well-coordinated; (b) issues affecting or potentially affecting project implementation are identified and addressed in a timely manner; (c) technical advice is provided to project component coordinators and relevant MOH staff in how to develop work plans, write terms of reference, and effectively manage consultant services; (d) safeguard issues are addressed in compliance with the Environmental and Social Assessment Framework (ESSAF); (e) necessary project inputs are provided in a timely and cost-effective manner; (f) project resources are appropriately managed in accordance with Bank requirements for procurement and financial management; (g) effective project monitoring and progress reporting are carried out; and (h) there is a systematic out-reach to various stakeholders to promote project objectives.

39. Since most of the project activities will take place in selected hospitals, the PMT/MOH and the MOH Directorates at the Governorate level will need to agree on operational and administrative procedures prior to implementation. As ownership, participation and commitment of the local health authorities are critical for the successful implementation of the project, much attention will be given to this process. A detailed implementation plan for each of the components is in Annex 9.

40. All procurement for project activities will be carried out at the central MOH level, with participation as needed from the MOH Directorates level. Given the urgency of this project, it has been decided that a technical assistance firm will be selected under the project to provide support and training to the PMT in procurement. This support will involve: (i) preparing civil works design and tender documents; (ii) preparing tender documents for medical equipment; (iii) providing support and advice in carrying out of tendering and selection procedures for both rehabilitation and medical equipment; and (iv) giving on-the-job training to the PMT staff and other relevant staff within the MOH. The technical assistance firm for this assignment should have extensive prior experience in World Bank procurement guidelines and procedures, as well as the technical and logistics capacity to provide this support within the current security environment in Baghdad.

Implementation of Component 1: Rehabilitation of Priority Emergency Services

41. The activities under this component cover physical rehabilitation of existing hospital emergency unit facilities and the provision of priority medical equipment and furniture for these facilities. Responsibility for the implementation of this component will rest with the MOH/PMT in coordination with the health authorities at the Directorate and hospital levels. The MOH Department responsible for the rehabilitation activities will be the Operations Department, and the Directorate of Specialized Medical Services will be responsible for the delivery of the medical equipment. The PMT will coordinate with these departments to ensure that the activities are carried out according to the project implementation plan. To accelerate the start-up process, each hospital emergency unit will hire a different consultant firm to prepare the architectural design for the site. These firms will be managed by the MOH Governorate level engineer, in coordination with the hospital management.

42. For the medical equipment, the MOH has already prepared generic lists, and 20 items have been identified for procurement. These items range from US$360 to US$45,000, and have been selected based on criteria agreed between the MOH and the Bank. The procurement and delivery of the medical equipment for the 12 selected facilities will be carried out in coordination with the rehabilitation activities, to ensure that the delivery and installation take place at the appropriate point in the rehabilitation process. In addition, preliminary plans have been prepared by the MOH for the use of temporary substitute sites for the emergency facilities that will be rehabilitated to ensure that the emergency services are not compromised by the project activities during the rehabilitation phase.

Implementation of Component 2: Provision of Essential Emergency Drugs

43. Procurement and distribution of the essential emergency pharmaceuticals to the 12 selected hospital emergency services units will be the responsibility of the MOH. The drug lists and quantities have already been prepared, and the procurement specialists of the PMT will prepare the tender documents. The pharmaceuticals will be procured through one tender, using ICB procedures except for one direct contract for the procurement of alteplase injection as there is only single manufacturing source in the world. A Special Committee will be established by the MOH to evaluate the bids and select the winning bidder.

44. According to the contract conditions, the delivery of the pharmaceuticals will be directly to the selected hospitals. The MOH will form a committee to receive the pharmaceuticals and ensure that they are consistent with the contract. The hospital Director will have overall responsibility for the appropriate storage and disposition of the pharmaceuticals that are received. Technical assistance will also be provided to assist the MOH to develop an improved drug supply chain for the country.

Implementation of Component 3: Capacity Building and Training

45. Responsibility for the implementation of this component will rest with MOH/PMT in coordination with the Directorate of Specialized Medical Services and the Center for Training and Human Development. The PMT will be responsible for ensuring the provision and coordination of necessary inputs with the necessary departments.

46. Activities under this component cover the capacity-building and training activities in Emergency Medical Services for the 12 selected sites. MOH/PMT will coordinate the emergency medical services activities with the Directorate of Specialized Medical Services and will ensure that the following training activities are conducted: (i) technical training of five-person emergency teams from each selected site to improve the quality of emergency services; (ii) training in management of emergency services for the hospital directors, emergency chief doctors, head nurses and central-level emergency services planners; and (iii) the development of a national plan for strengthening emergency health care services. Additionally, the PMT will coordinate the MOH health systems management and planning training with the Center for Training and Human Development. These trainings will involve MOH staff in these areas from both central and Directorate levels.

Implementation of Component 4: Project Management

47. The Ministry of Health will be responsible for ensuring that the PMT is duly established and staffed with sufficient expertise and skills to carry out the implementation of the project. In addition, the MOH is responsible for securing adequate office space within the Ministry for the PMT. The PMT will act as both the coordinating unit for technical implementation of the components, and the "business office" for the project.

48. The PMT will comprise: (i) a Director, who is responsible for coordinating the day-to-day project activities, as well as the business office functions of project management, and liaising with the World Bank and the MOH Departments implementing project components; (ii) a Deputy Director, who supports the Director in overall management of the PMT, as well as providing back-up to the Director in his/her absence; (iii) a Technical Coordinator who will ensure coordination of the technical aspects of the project; (iv) a Financial Officer and Accountant; (v) a Procurement Officer and three specialists (civil works, equipment/drugs, and consultant services); and (vi) an Executive Secretary and Junior Secretary. In addition, there will be drivers for the three project vehicles and a messenger.

49. The PMT staff will have the opportunity through the Project to receive training relevant to their assignments, in the areas of procurement, financial management, monitoring and evaluation, and in project management. Initial courses in these areas have already been provided to selected MOH staff by the Bank outside of Iraq in the region during the preparation period, and these will be continued periodically under the project.

50. Experience with health projects within the region has shown that clear definition of implementation procedures, including the PMT responsibilities and support to project activities, is a very important element of a successful project. In order to achieve this objective, the MOH will select well-qualified staff for the PMT, including a full-time Deputy PMT Director and a

Technical Coordinator to support the PMT Director, to ensure that the appropriate oversight and management of the project activities are in place. The Project Implementation Manual (PIM) is being prepared in conjunction with the relevant technical staff in the MOH central and Governorate offices. However, it is recognized that the PIM is a starting point intended to ensure clear understanding between the implementing agency and the Bank, and is not to be used as a "straight jacket". The PIM can be revised during project implementation with the mutual agreement of the Bank and Government.

Procurement

General

51. Procurement for this project will be carried out in accordance with the World Bank's "Guidelines: Procurement under IBRD Loans and IDA Credits" dated May 2004; and "Guidelines: Selection and Employment of Consultants by World Bank Borrowers" dated May 2004, and the provisions stipulated in the Trust Fund Grant Agreement. The general description of various items under different expenditure categories is given below. For each contract to be financed by the Grant, the procurement methods or consultant selection methods, the need for prequalification, estimated costs, prior review requirements, and time frame are agreed between the Recipient and the Bank project team in the Procurement Plan (PP). The PP will be updated as required to reflect the actual project implementation needs and improvements in institutional capacity. A general procurement notice was published in the UNDB in November 2004 and will be revised after approval.

52. Procurement of Works. Works procured under this project will include rehabilitation of hospital emergency units. Due to the small value of each contract and the volatile security conditions in Iraq, it is not expected that international contractors will be interested in the works contracts. All procurement of works will follow National Competitive Bidding (NCB). Thus, no contract is expected to be procured using International Competitive Bidding (ICB) procedures; however, international contractors would be eligible to bid on NCB contracts if they choose to participate. The procurement based on NCB procedure will be done using the Bank's Standard Bidding Document (SBD) for small works. Once an NCB bidding document for works is prepared (currently under preparation as part of the Master Implementation Manual (MIM)), reviewed and found satisfactory to the Bank, it will be used instead of the Bank's SBD for NCB procurement.

53. Procurement of Goods. Goods procured under this project will include procurement of pharmaceuticals and medical equipment, hospital furniture, office furniture, computers and office supplies needed by the MOH-PMT for the project implementation. The procurement will be done using ICB, NCB, Shopping procedures, and in exceptional cases, Direct Contracting may be used for procurement of goods of small value such as office supplies and equipment as described in the procurement plan. Pharmaceuticals and medical equipment will be procured using International Competitive Bidding (ICB) procedures and the SBD for procurement of health goods. Single source will only be used in exceptional cases for the procurement of pharmaceuticals. Although the preferred method for the procurement of pharmaceuticals is based on grouping the items into lots, it seems that the list of pharmaceuticals to be purchased under the project may not be grouped into lots that will attract responsive bids from

manufacturers. Thus, it is expected that the procurement of pharmaceuticals will be on an item-by-item basis. The procurement based on NCB procedure will be done using the Bank's SBD for procurement of goods. Once an NCB bidding document for goods is prepared (currently under preparation as part of the Master Implementation Manual), reviewed and found satisfactory to the Bank, it will be used instead of the Bank's SBD for NCB procurement.

54. Selection of Consultants. Consultant services procured under this project will include: (i) selection of an international procurement consulting firm to support the building of MOH capacity to manage procurement activities; (ii) selection of individual consultants and/or firms to provide training and assessment studies in the pharmaceutical sector; (iii) capacity building in financial management; and (iv) selection of local consulting firms to provide consultancy services in engineering, bidding document preparation and construction supervision. The procurement consulting firm will be selected based on Consultants' Qualifications (CQ) procedures. All consulting services including those for architectural design and supervision will be selected based on CQ procedures with the exceptions of selection of five PMT consultants and the pharmaceutical sector consultants which will use selection procedures for individual consultants

55. Operating Costs: The Grant will finance expenditures directly related to the management of the project, such as: (i) maintenance of office equipment; (ii) transportation and travel, including per diem allowances for Project staff in travel status; (iii) office supplies, utilities and office administration, including translation, printing and advertising; (iv) fuel costs; (v) communication costs; (vi) costs for production of bidding documents and drawings; and (vii) commercial bank charges. No salaries of the Recipient's civil servants will be financed under the project. The operating costs that will be financed by the project will be procured using the MOH administrative procedures for shopping satisfactory to the Bank.

Assessment of the agency's capacity to implement procurement

56. A generic assessment of Iraqi ministries' capacity to implement project procurement was conducted in March 2004. Given that the security conditions prevented the Bank project team from traveling to Iraq at the time of project preparation, a quick assessment of the capacity of the MOH to implement procurement actions for the project was also carried out by the team's Senior Procurement Specialist in October 2004 through discussions with MOH staff in Jordan during the pre-appraisal/appraisal of the project. Subsequently, the generic assessment has been revised to reflect the MOH's capacity to implement procurement.

57. Procurement activities for the project will be carried out by the PMT, in collaboration with relevant departments of MOH. There is no centralized procurement department in the current organizational structure of the MOH. Procurement is carried out by each department of the MOH. There will be separate committees for bid opening and bid analysis and evaluation. These committees would be established on ad hoc basis, with a minimum of three members from different departments.

58. At the MOH Headquarters, the Directorate of Projects and Engineering Services prepares/reviews bidding documents, including drawings, bill of quantities, general and special

contract conditions and technical specifications for priority health care and hospital rehabilitation and new construction. In the past, the MOH has implemented more than 30 new additions and rehabilitation of primary health care projects, valued at approximately US$50 million.

59. A Ministerial decree has been issued recently stipulating that procurement for major hospitals with a value of less than 50 million Iraqi Dinars can be conducted at the hospital level. For contracts valued at less than 300 million Iraqi Dinars, procurement can be conducted at the Health Directorate level. For amounts above this threshold, the Directorate can advertise, receive, open, evaluate bids, but has to get the approval from the Ministry for final recommendation to award and endorsement before signing the contracts.

60. KIMADIA is the State Company for the Marketing of Drugs and Medical Appliances which operates as a department of the Ministry of Health in Iraq. KIMADIA has managed the procurement of pharmaceuticals and medical equipment for MOH for many years, mainly through the medium of tendering to a list of registered manufacturers and suppliers. KIMADIA has the following main responsibilities: (i) purchasing from all local and international companies; (ii) distribution of drugs, medical supplies and equipment according to the needs of health institutions nationally; (iii) maintenance and servicing of medical equipment in health institutions; and (iv) procurement, receipt, warehousing and distribution of pharmaceuticals and hospital supplies and equipment.

61. All manufacturers and suppliers wishing to supply to the MOH need to be registered as a supply source. The process involves submission of technical information on the company and its products and of samples. The samples undergo testing in the laboratories of the drug regulatory authority which involves significant delays due to recent damage to the laboratories. Because of these delays, it has been agreed that for any unregistered suppliers wishing to participate in the Bank-financed tender, the requirement to supply samples will be waived provided the bidders can provide evidence that they have FDA and/or EU approval to supply their products.

62. It has long been acknowledged that KIMADIA will need substantial capacity building to incorporate the principles of open competitive tendering. KIMADIA and the MOH on whose behalf they act will gain significant benefit from training in the methodologies of internationally accepted procurement practices. This training is supported under the proposed project, both through provision of technical specialists to support the day-to-day management of procurement, and through training courses.

63. To strengthen the procurement capacity of the MOH, a procurement officer will be appointed to the MOH-PMT. A simple PIM is under preparation (it is expected that the manual will be ready by December 31, 2004) and the MOH-PMT will use this manual in the implementation of the project. The PIM will be aligned with the Master Implementation Manual as soon as the latter becomes available. The MIM is a global manual for all the projects under the ITF.

64. Private Sector Assessment. The private sector, local and foreign, participates in public procurement of goods and services. Registration of national contractors by the MOPDC is a routine practice. Contractors are classified and ranked against criteria, including experience,

performance, and financial status. There are some 160 contractors classified as class A. A procuring entity may limit the invitation to bid to certain classes of contractors. Based on a meeting with the head of the contractors' union in Iraq during the mission in Amman, local contractors appear to be capable of executing the type of works contracts proposed under the project, and even much larger projects. Demonstration of financial capacity of contractors may be a difficult task as they are accustomed to working on a cash basis, especially during the previous era. The contractors demonstrated that they have no problem getting bid securities from local banks, and welcomed very much the opportunity for training on bid preparation. Training on bid preparation is planned as part of the scope of work of the international procurement consulting firm.

65. There are several local consulting firms that appear to be capable of carrying out the design, preparation of bidding documents and construction supervision. However, the local consulting firms have no previous experience with preparation of proposals, and the quality of their work still would need to be tested. Training on proposal preparation is planned as part of the scope of work of the international procurement consulting firm.

66. On the basis of the above information and analysis, it can be assumed that local private sector contractors will be able to compete for and execute the contracts under this project.

67. The Bank procurement specialist has already provided a quick training session on procurement terminology and Bank procurement procedures to the MOH team. The procurement officer for the project has been assigned by H.E. the Minister of Health during the appraisal mission. The procurement officer attended procurement training conducted by the World Bank Procurement Specialist in March – April, 2004 during his assignment on the ITF-financed Emergency School Construction and Rehabilitation Project. The training included procurement planning, bidding document preparation, procurement guidelines, procedures and methods for procurement of works, goods and selection of consultants. Further procurement training will be provided throughout project implementation by the procurement consulting firm and during the Project launch workshop. During the mission, the procurement officer started preparing the bidding documents for the procurement of pharmaceutical drugs with assistance from the Bank team.

68. The overall project risk for procurement is rated as high. Most of the issues and risks concerning procurement under the project have been identified in the generic assessment of the MOH's capacity to implement project procurement and include: (i) the lack of sound laws and regulations, the lack of modern standard documentation, and the routine practices acquired by procurement staff, specially those in KIMADIA, during the previous era which will take time to change; (ii) weakness of MOH procurement staff in use of Bank procurement guidelines and international sound procurement practices; (iii) inability of Bank procurement staff to supervise the project in the field; (iv) delays in implementing the procurement plan due to lack of experience in procurement planning and the volatile security conditions in Iraq; (v) increase of prices of construction raw materials due to high demand and unavailability of these materials which may impact subproject completion due to the unwillingness of contractors to continue working based on old contract prices; (vi) possible looting of construction sites as well as leakage of drugs outside the MOH stores to the private sector; and (vii) delays in the

implementation of some contracts as well as in bid submission, due to deteriorating security conditions in some areas of the country.

69. The corrective measures which have been agreed are: (i) a procurement officer is already assigned as part of the MOH-PMT; (ii) simplified bidding documents and methods such as shopping and NCB, a Bank bidding document for small works, the US Dollar as currency of bids for NCB, and shopping will be used; (iii) in the contract, a statement will be included that contractors will be responsible for guarding hospital construction sites during construction, and an inventory of hospital fixtures will be documented before the contractor starts working. The contractor will be responsible for these fixtures at the time of final handover of the project; (iv) to mitigate the problem of inability of some contractors from a different locale to work in certain areas of Iraq due to the security conditions, a clause in the works bidding document would be added requesting bidders to provide a methodology for accessing the hospital site and contractor's ability to work; (v) a decree was issued on June 23, 2004, by the Minister of Health to rectify the shortcomings in the current procurement practice; and (vi) the procured drugs and the medical equipment will be delivered directly to the 12 rehabilitated hospitals and not stored in KIMADIA central stores. In addition, an international procurement consulting firm will be hired by the MOH to build MOH capacities to: carry out and manage procurement activities; set up within the MOH a procurement monitoring and reporting system; assist the MOH-PMT in preparing/reviewing bidding documents and bid evaluation reports; and build procurement capacity in the MOH. The procurement consulting firm will also conduct workshops for the local contractors and local consultants on bid preparation and proposal preparation, respectively. In addition, the consulting firm will be available to respond to ad hoc requests for advice or training. Until security conditions in Iraq improve, training workshops may take place outside the country (preferably in a neighboring country). An action plan will also be prepared by the MOH-PMT to train the MOH staff in the Governorates and in KIMADIA on procurement.

Procurement Plan

70. The MOH, at appraisal, prepared a Procurement Plan (Annex 4) for project implementation which provides the basis for the procurement methods to be used in this Project. This plan was agreed between the MOH and the Bank project team on October 7, 2004, and will be available in the project's database and on the Bank's external website. The Procurement Plan will be updated in agreement with the Project Team as required to reflect the actual project implementation needs and improvements in institutional capacity.

Frequency of Procurement Supervision

71. In addition to the prior review supervision to be carried out from Bank offices, and based on the capacity assessment of the Implementing Agency, at least one supervision mission is planned every three months to visit the field to carry out post reviews of procurement. Until security conditions make travel to Iraq possible for Bank staff, the Bank will employ Monitoring Agents, independent firms which will operate in Iraq and support the Bank in carrying out its supervision function, including spot physical inspection. In addition, the Bank will rely on reports from a local procurement consultant who is working for the Bank from within Iraq. During the interim period, Bank staff and the concerned Iraqi procurement staff will meet

outside Iraq to carry out off-site supervision as well as using videoconference facilities to maintain effective communication on the progress of the Project.

Disbursement

72. The proposed grant of US$25 million is expected to be disbursed by December 31, 2006. Annex 5, Table A describes the allocation of the grant proceeds according to each expenditure category.

73. The Bank's strategy in Iraq is to ensure Iraqi ownership and strengthen institutional capacity by financing operations that are implemented by Iraqi ministries and other recipient entities. Trained Project Management Teams (PMTs) will facilitate implementation and help ensure compliance with fiduciary and other safeguards. PMTs will be employed and paid by the implementing agency at regular salary levels, thereby avoiding the disadvantages of stand-alone Project Implementation Units, which can erode civil service institutional capacity over the medium and long term. The project will finance specialized technical support in procurement, financial management, and other areas as needed. In addition, to ensure that project funds are used for the purposes intended and to help carry out project supervision, the Bank will employ two independent firms as fiduciary and safeguard Monitoring Agents.

74. As a further compensating control, disbursements will be made primarily through direct payment by the Bank to the contractors, consultants, and vendors. Once authorized by the MOH, direct payments will be made by the World Bank directly into the account of the contractor, consultant, or vendor in a commercial bank capable of receiving funds transferred from the international banking system.

75. The project management component and payments below the threshold of US$10,000 normally will be made through payments by the Recipient from its own resources. These payments made from the Recipient's own resources will be reimbursed, on a periodic basis, by the Bank to the MOH upon presentation of full supporting documents, proof of payment and a signed withdrawal application. The Bank may later require the use of Statements of Expenditure (SOE) for payments below US$10,000. The MOH-PMT and the main financial counterparts from the MOH will be subject to intensive training in Bank disbursement procedures.

Financial Management

76. Bank policies require that grant proceeds be used for the purposes for which they were granted, with due regard to economy, efficiency, and the sustainable achievement of the project's development objectives. The Recipient (MOH) is required in this regard, to maintain an appropriate and adequate financial management system, including records and accounts, and to prepare financial statements that accurately reflect the project operations, resources, and expenditures. The Trust Fund Grant Agreement also commits the Recipient to have the accounts, records, and financial statements of the grant audited for each fiscal year by a qualified auditor acceptable to the Administrator following internationally accepted standards.

77. Financial Management Risk Assessment. The financial management risk associated with this operation is considered high. Critical risk factors are: (i) ongoing insecurity, which prevents onsite Bank supervision and assessments, including financial management assessments; (ii) the Bank's limited knowledge of Iraq's public financial management systems, controls, and procedures; (iii) the limited knowledge on the part of Iraqi authorities of Bank policies and guidelines; (iv) the possibility of MOH not making available on a timely basis financial resources to honor payments below the value of US$10,000; (v) difficult communication and flow of information between worksites and the PMT, which could delay payments; (vi) inefficiencies in Iraq's banking system that may delay payments and transfer of funds to contractors, suppliers, or MOH; and (vii) variation order requests that may exceed price contingencies and difficulties may be encountered in verifying justifications for variation orders. Although the project design mitigates these risks to the extent possible, the project will require close monitoring and supervision during implementation.

78. The control risks will be mitigated by putting in place additional controls and procedures, including: (i) the PMT will verify and authorize all payments under the project and verify justifications for variation orders; (ii) the PMT will be assigned competent financial staff from the MOH who will be supported, as needed, by financial management consultants; (iii) the MOH has identified qualified staff from the MOH finance department, including the internal auditor, who will track the project activities, ensuring that the MOH team is well-informed about Bank guidelines and policies and is able to track project transactions and provide support to the PMT; (iv) disbursements by the Bank will be made primarily through direct payments supported by documentation; (v) the fiduciary Monitoring Agent will review project expenditures and withdrawal applications; and (vi) appropriate training of finance staff at the PMT will be provided.

79. The accounting and reporting risks will be managed by putting in place a simple parallel accounting system to record all project expenditures, monitor project commitments in real time during the implementation period, and provide the data needed to generate project reporting, including the Bank required Financial Monitoring Reports (FMR).

80. With respect to project auditing arrangements, an external independent auditor with international experience will be engaged to perform the project audits and issue an independent opinion on project financial statements. This external audit report will encompass all project activities and will be presented in accordance with internationally accepted auditing standards. The audit report along with the related financial statements should be submitted to the Bank not later than four months after the end of the Government's fiscal year.

81. All the above activities and procedures will be documented in a chapter of the Project Implementation Manual which will be in line with the Master Implementation Manual (MIM). Details on project risks, mitigation measures, and financial management arrangements are in Annex 5.

Project Supervision

82. Project activities will be completed by December 2006. Supervision will include visits to the MOH, MOF, MOPDC, and to hospital sites for the purpose of reviewing implementation progress, impact of project activities, and related documentation.

83. The MOH-PMT will prepare and send to the Bank a quarterly progress report. The first report will be due starting at the end of the first quarter following the initial disbursement. The format of the report has been agreed during appraisal.

84. The Bank, as the Iraq Trust Fund (ITF) Administrator, will supervise ITF-funded operations in accordance with the Bank's applicable policies and procedures. While staff travel to Iraq is restricted, supervision of recipient-executed operations will be carried out through consultants and the Monitoring Agents. Each ITF-funded operation is required to include a results-based supervision plan that reflects realities on the ground.

85. Reporting to Donors. The Bank will maintain separate records and ledger accounts in respect of the funds deposited by the donors with the Bank under the ITF. Within ninety (90) days of the end of each quarter (March 31, June 30, September 30, and December 31), the Bank will prepare, on a cash basis, an un-audited statement of receipts, disbursements, and fund balance with respect to the ITF and forward a copy to each donor. Each such statement will be expressed in United States Dollars, the currency in which the ITF funds will be maintained by the Bank. In addition, within one hundred and eighty (180) days of the completion of all disbursements relating to activities financed from the ITF, the Bank will prepare on a cash basis an un-audited financial statement of receipts, disbursements, and fund balance with respect to the ITF and forward a copy to each donor.

86. The Bank will furnish the donors:

(a) on a semi-annual basis, a consolidated report describing the operations of the ITF (including contributions, disbursements, and implementation progress) in the preceding six months; and

(b) on an annual basis, a management assertion, together with an attestation from the Bank's external auditors, concerning the adequacy of internal control over cash-based financial reporting for trust funds as a whole.

87. The Bank will require a financial statement audit of the ITF to be performed by the Bank's external auditors on an annual basis. The costs of such an audit, including the internal costs of the Bank with respect to the audit, will be charged to the ITF. The Bank will provide each donor with a copy of the auditor's report.

88. The Bank will maintain close consultation and coordination with the donors. The Bank will provide each donor to the ITF with semi-annual reports on its quarterly ex-post evaluation of the activities undertaken by the Monitoring Agents. Within six months of completion of the activities, or of full disbursement of the contributions, whichever comes later, the Bank will provide a final progress report to each donor, together with a copy of the independent review of

the performance of the Monitoring Agents. Upon request by any donor, the Bank will send to such donor the draft and final reports received by the Bank from the Monitoring Agents on the activities financed by the contributions.

Environmental and Social Safeguards

89. Environmental Safeguards: The Project is rated category "B". Impacts would be those associated mainly with (i) rehabilitation works (e.g., safety, dust, noise, waste material, traffic); (ii) provision of sanitary services, water supply and waste management; and (iii) maintenance of facilities. Because of the emergency conditions, the requirement to carry out a limited Environmental Analysis as part of project preparation will be waived. However, for sub-projects with adverse environmental impacts, a limited Environmental Analysis will be done during project implementation but before sub-project approval. The Environmental and Social Screening and Assessment Framework (ESSAF) was disclosed in the country and in the Infoshop on October 7, 2004. Based on the ESSAF, the following standards will be applied during implementation: (i) inclusion of standard environmental codes of practice (ECOP) in the rehabilitation and extension bid documents of all sub-projects (Annex 7A); (ii) use of Safeguard Procedures for Inclusion in the Technical Specifications of Contracts (Annex 7B); (iii) use of the Checklist of likely Environmental and Social Impacts of Subproject; (iv) review and oversight of any major reconstruction works by specialists; (v) implementation of environmentally and socially sound options for civil works; and (vi) provision for adequate budget and satisfactory institutional arrangements to monitor effective implementation and adequately maintain sanitary facilities after completion. Capacity building on Safeguards and on the implementation of the ESSAF has already been undertaken with the Ministry of Environment and other line Ministries. Details on the handling of medical and non-medical waste are in Annex 7.

90. Resettlement and Land Acquisition: There will be no construction of new facilities in the Project. However, there will be some site extensions that will be limited to vacant sites that are on public property assigned by the relevant authorities for the use of MOH. OP 4.12 should not be triggered since there should not be any displacement of populations or new land acquisition. However, the ESSAF, specifically elaborated for due diligence in the case of Iraq, should be used to ensure that this is indeed the case and should there be any need for land acquisition or population resettlement, the same guidelines will be followed.

91. An MOH-PMT specialist will be trained in WB safeguards policies and MOH engineering staff (or consultants where capacity is lacking) will carry out site supervisions to check on compliance of contractors with environmental and social safeguards. Site supervision reports will include a section on environmental and social safeguards that will be filed with the MOH-PMT. The first three site supervision reports will be sent to the Bank for review.

E. FINANCIAL AND ECONOMIC JUSTIFICATION

92. This project is prepared as part of the interim strategy of the World Bank in addressing the pressing needs of the sector and according to the emergency recovery assistance procedures (OP 8.50). The lack of reliable statistics, the limited economic information, and the speed at which the project has been prepared have prevented more detailed analysis, a familiar constraint in such operations. However, the benefits of the project's investment are expected to be

substantial compared to its costs, as it addresses urgent needs in an environment of devastated infrastructure, deteriorating quality, and escalating needs. The project will support the rehabilitation of 12 hospital emergency facilities in 9 Governorates. It is estimated that approximately 14,500,000 persons living in the surrounding perimeters of the rehabilitated facilities will have access to high quality emergency medical services that otherwise would not have been adequately delivered. This Project will support expansion of the emergency room capacity in the selected sites, improve the quality of emergency services, and reduce mortality, as well as building the technical and management capacity of the MOH.

93. Recurrent costs of the facilities rehabilitated by the Project will be met from the MOH operational budget. Future maintenance costs of the 12 rehabilitated and equipped facilities will be covered by the overall MOH budget and do not constitute a sustainability problem. However, the sustainability of the pharmaceuticals procurement could become an issue during the medium term. This being said, the expected resumption of oil exports in Iraq and the economic reform policies that are being introduced are expected to stimulate sustainable growth over the medium term and provide resources for such types of expenditure.

F. RISKS

94. The political and security environment in Iraq is currently very unstable and uncertain, and poses obvious risks to the proposed project. The table below provides a summary of the key project risks that have been identified, and the measures to be taken to mitigate those risks.

Risk Analysis

Risk	Rating	Mitigation Measures
From Outputs to Objectives		
New Iraqi administration emerges from January 2005 elections– unknown outcomes that could affect project implementation	S	Keeping project simple. Working closely with Ministry officials to ensure ownership.
Administration changes in MOH – jeopardizing current commitment to project design and inputs	M	Building relationships at the technical level with current officials to ensure continuity in the event of changes.
Multiple efforts and parallel tracking by the various agencies and bilateral donors causing fragmented reform efforts	M	Current multi-agency group, chaired by the MOH, seeks to harmonize efforts and responsibilities. Also, the Iraqi Strategic Review Board (ISRB) and its required approval before project financing will ensure minimal overlap.
From Components to Outputs		
Collection of comprehensive information on the status/condition of facilities to enable planning and priority setting may not be collectable within the time constraints of the Project	L	Working with MOH to identify the major project sites by Governorate and on the basis of agreed criteria. The MOH has already identified the sites.
Security conditions deteriorate, making access by contractors to sites and supervision difficult	H	Use of local contractors and local staff for supervision, plus carefully crafted monitoring arrangements by governorate/directorate assigned staff

Financial management--inability to comply with Bank requirements due to systemic problems in banking and accounting practices	M	The current disbursement process of direct WB payments for large contracts will be adopted. Early consultation will be sought from Financial Management consultants to design a simple system that meets project needs and the Bank's financial management requirements.
The Bank's inability to carry out in-country supervision	S	Efforts are being made to identify local consultants that would be contracted to assist in supervision. In addition, special monitoring instruments would be designed for the use of MOH implementation staff and these supervision consultants.
Failure of government to meet the incremental operating and maintenance costs of the investments under the Project.	S	The capacity building component of the Project will provide support to the Ministry in health services management budgeting and planning. This will include development of monitoring tools to track maintenance of health services facilities and equipment.
Procurement Risks		
The lack of adequate laws and regulations, of modern standard documentation, and persistence of habits acquired by procurement staff in the previous era may take time to change.	H	A decree was issued by the Minister of Health rectifying shortcomings in the current procurement practice at the MOH. Continuous training will be provided by an international procurement consulting firm.
Lack of experience of procurement staff in procurement using Bank procurement guidelines and sound international procurement practice.	H	The international procurement consulting firm will provide training and support to the MOH on World Bank procurement guidelines, bidding document preparation, bid evaluation. Close supervision by Bank staff, including Bank hired procurement consultant based in Baghdad. A project launch workshop is planned soon after grant signature.
Inability of Bank procurement staff to supervise the project in the field.	H	Post reviews and other procurement matters will be covered in the first instance by the local procurement consultant working for the Bank.
Delays in implementing the procurement plan due to lack of experience in procurement planning and the volatile security conditions in Iraq.	H	The international procurement consulting firm will provide training and support to the MOH-PMT and relevant MOH governorate and hospital staff. Workshops would be planned outside Iraq until condition permit international consultants work within Iraq.
Possibility of high prices due to high demand on local construction industry.	H	Provision has been made in the Project budget for price and physical contingencies.
Contractors lack experience of Bank procurement procedures.	M	International consulting firm will plan to conduct training for consultants and contractors on proposal preparation and bid preparation, respectively. A pre bid meeting will be planned before bidders submit bids and MOH will stress the requirement for responsive bids in this meeting.

Security conditions deteriorate, making access by contractors to sites and supervision difficult.	H	Use of local contractors and local staff for supervision, plus monitoring arrangements by MOH directorate/hospital assigned staff as well as local consulting firms. A clause in the bidding document will be introduced requesting bidders to provide a methodology for accessing the site and conducting work in the hospital sites.
Leakage of drugs from MOH/KIMADIA to private sector	M	Provision in the bidding document will be introduced for the direct delivery by the supplier of drugs to the rehabilitated hospitals instead of going into a general store in KIMADIA/MOH.

Financial Management Risks

Risk	Initial Risk Rating	
Limited knowledge of the financial management capacity in the MOH.	H	The Bank gained some knowledge on Iraqi PFM system by appointing a consulting firm to assess the financial management capacity of several Iraqi ministries. Bank staff also conducted their own interviews with Iraqi officials in Amman and reviewed PFM system documentation. Further knowledge was gained from an audit report by an international audit firm
Limited capacity to manage financial requirements of the Project.	H	The PMT will be staffed with Financial Officers, including a qualified financial manager, a financial officer, and a finance assistant, who will manage disbursements from the proceeds of the grants, managed and supervise project accounts, retain financial records, and prepare project reports.
Lack of familiarity with Bank guidelines and regulations in MOH.	H	Training will be provided to MOH and MOH-PMT staff on Bank guidelines and regulations.
Difficulties in making payments to suppliers inside and outside Iraq; possible risks associated with Iraq banking sector.	H	All payments above US$10,000 will be made through direct payments. Inefficiencies in the banking and payment system in Iraq remain a major risk factor for such payments. The Bank uses Wachovia for US$ payment in Iraq. Also the Bank discussed with Citi Bank and Standard Chartered their abilities to transfer funds into Iraqi Banks
Verification of work performed and goods delivered.	H	For works, the Monitoring Agent will review sample of works completed. The MOH will form a committee to receive the pharmaceuticals and ensure that they are consistent with the contract.
Accounting policies and procedures: may not meet Bank management and reporting requirements.	M	The Financial Operations chapter of the Project Implementation Manual will define financial policies and procedures. The control policies applicable to the MOH will be used to monitor the project accounts.

The MOH not being able to provide funds from its own resources to cover expenditures below US$10,000.	H	The Ministry's commitment to providing the required funds will be sought during negotiations.
Internal audit: Existing arrangements for internal audit are not adequate and officials may not be familiar with project requirements.	M	The Minister will assign one internal auditor (champion) to review project transactions and will report to the Minister. The assigned internal auditor will be introduced to the project and receive training on Bank guidelines in the PMT Training Workshop.
External audit: Unknown capacity of auditing firms in Iraq. There was no capacity assessment for the audit profession in Iraq to determine capability to perform audits as per ISA.	H	External audit will be carried out by an independent auditor with international experience and in accordance with terms of reference acceptable to the Bank.
Reporting and Monitoring: Current MOH systems do not generate required reports.	H	A "ring-fenced" project accounting system, initially based on spreadsheet applications, will generate the data for the FMRs.
Information systems: Not functioning reliably in MOH	H	The use of simple spreadsheet-based reporting format has been agreed upon.
Difficulty in verifying justification for variation orders and possibility of variation orders exceeding price contingencies.	H	PMT will be responsible for verifying variation orders. The fiduciary monitoring agent will assist, to the extent feasible. Price contingencies have been calculated on the basis of recent prices. Given the volatility of the market, however, should price contingencies be insufficient to cover the variation orders, scope of work will be scaled back.
Overall risk	H	

H = High Risk; S = Substantial Risk; M = Modest Risk: N = Low or Negligible Risk

ANNEX 1: RESULTS FRAMEWORK AND MONITORING

Component	Key Performance Indicators		Source/Resp Party
	Outputs	**Outcomes**	
1. Rehabilitation of priority emergency services in 12 hospitals	Number of emergency units rehabilitated. Basic emergency equipment packages procured for the facilities rehabilitated.	Number of emergency units rehabilitations completed and providing quality emergency services. Number of hospitals with new emergency unit equipment in use.	• Procurement reports • Field visits (PMT) • Progress reports (PMT/Hospital managers) • Hospital utilization data (Hospitals and MoH statistics)
2. Provision of essential emergency drugs	Basic emergency pharmaceutical packages procured and distributed.	Decreased incidence of pharmaceutical shortages at the facilities in a six month period.	• Procurement reports • Field visits (PMT) • Progress reports (PMT) • Quarterly hospital reports (Hospital managers/PMT)
3. Capacity-building and training of MoH staff	Number of training activities conducted on emergency medical services for facility EMS staff. Number of staff trained in management of EMS. Number of MoH staff trained in health planning, management and procurement.	Number of staff trained in emergency medical services applying new skills. Improved capacity of MOH staff in health planning, management, and procurement.	• Participant evaluations/Self-evaluations • Follow-up survey regarding application of methods learned • PMT supervision
4. Project Management	Project management team inside the MoH with the capacity to prepare, issue, monitor and manage project activities.	Project management capacity built in a core group of MoH staff and consultants.	• PMT reports

ANNEX 2: SUMMARY COST TABLES
(US$ '000)

Project Cost Summary

	Cost Including Contingencies	% of Total	Trust Fund Financing	% Financing
1. Hospital Emergency Services	21,434	79.6	19,634	91.6
2. Provision of Essential Emergency Drugs	2,911	10.8	2,911	100.0
3. MOH Capacity Building	1,668	6.2	1,668	100.0
4. Project Management	911	3.4	786	86.2
Total PROJECT COSTS	26,925	100.0	25,000	92.8

Components by Financiers

	The Government		Trust Fund		Total	
	Amount	%	Amount	%	Amount	%
1. Hospital Emergency Services	1,800	8.4	19,634	91.6	21,434	79.6
2. Provision of Essential Emergency Drugs	-	-	2,911	100.0	2,911	10.8
3. MOH Capacity Building	0	-	1,668	100.0	1,668	6.2
4. Project Management	125	13.8	786	86.2	911	3.4
Total PROJECT COSTS	1,925	7.2	25,000	92.8	26,925	100.0

Expenditure Accounts by Financiers

	The Government		Trust Fund		Total	
	Amount	%	Amount	%	Amount	%
I. Investment Costs						
A. Civil Works						
Extensions	-	-	4,339	100.0	4,339	16.1
Rehabilitation	-	-	8,577	100.0	8,577	31.9
Temporary Emergency Units /a	1,800	100.0	-	-	1,800	6.7
Subtotal Civil Works	1,800	12.2	12,915	87.8	14,715	54.7
B. Goods						
1. Medical Equipment	-	-	4,024	100.0	4,024	14.9
2. Office & Other Equip.	-	-	233	100.0	233	0.9
3. Furniture	-	-	1,238	100.0	1,238	4.6
4. Pharmaceuticals	-	-	2,855	100.0	2,855	10.6
Subtotal Goods	-	-	8,350	100.0	8,350	31.0
C. Consultant Services						
1. Design and Supervision	-	-	1,328	100.0	1,328	4.9
2. Technical Assistance						
Firms	-	-	255	100.0	255	0.9
Individual Consultants	125	40.6	184	59.4	309	1.1
Subtotal Technical Assistance	125	22.2	439	77.8	564	2.1
Subtotal Consultant Services	125	6.6	1,767	93.4	1,892	7.0
E. Training	-	-	1,862	100.0	1,862	6.9
F. Operating Costs	-	-	105	100.0	105	0.4
Total PROJECT COSTS	1,925	7.2	25,000	92.8	26,925	100.0

\a To substitute existing units during rehabilitation (Financed by MOH)

Expenditure Accounts by Components
(US$ '000)

	Hospital Emergency Services	Provision of Essential Emergency Drugs	MOH Capacity Building	Project Management	Total
I. Investment Costs					
A. Civil Works					
Extensions	4,339	-	-	-	4,339
Rehabilitation	8,577	-	-	-	8,577
Temporary Emergency Units /a	1,800	-	-	-	1,800
Subtotal Civil Works	14,715	-	-	-	14,715
B. Goods					
1. Medical Equipment	4,024	-	-	-	4,024
2. Office & Other Equip.	129	-	-	104	233
3. Furniture	1,238	-	-	-	1,238
4. Pharmaceuticals	-	2,855	-	-	2,855
Subtotal Goods	5,391	2,855	-	104	8,350
C. Consultant Services					
1. Design and Supervision	1,328	-	-	-	1,328
2. Technical Assistance					
Firms	-	-	-	255	255
Individual Consultants	-	56	-	253	309
Subtotal Technical Assistance	-	56	-	508	564
Subtotal Consultant Services	1,328	56	-	508	1,892
E. Training	-	-	1,668	194	1,862
F. Operating Costs	-	-	-	105	105
Total PROJECT COSTS	21,434	2,911	1,668	911	26,925
Taxes	-	-	-	-	-
Foreign Exchange	11,020	2,860	1,490	324	15,694

\a To substitute existing units during rehabilitation (Financed by MOH)

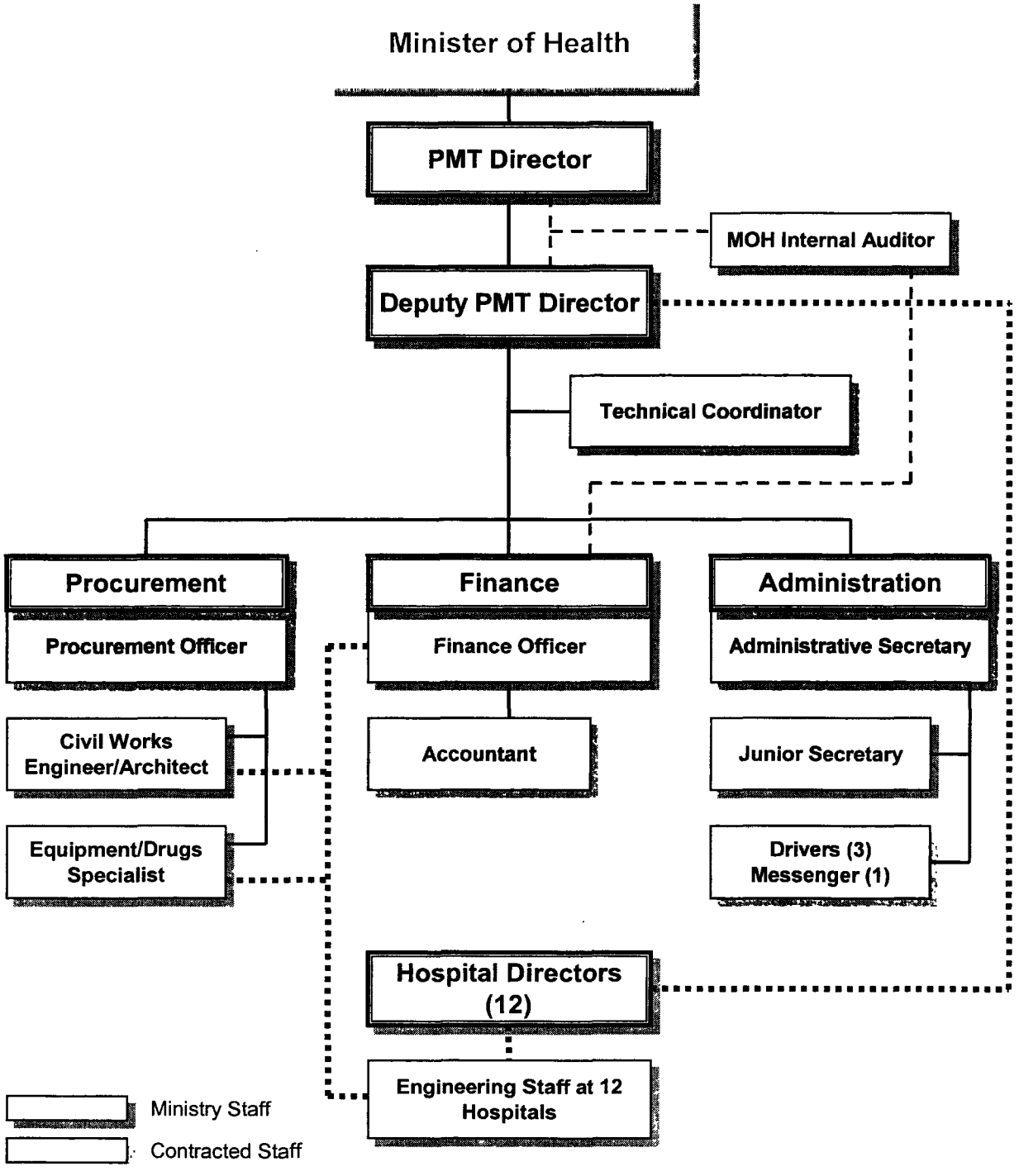
Procurement Arrangements
(US$ '000)

	Procurement Method								
	International Competitive Bidding	National Competitive Bidding	Consulting Services	Consulting Services: CQ	Shopping	Direct Contracting	Other	N.B.F.	Total
A. Works /a	-	12,915	-	-	-	-	-	1,800	14,715
		(12,915)							(12,915)
B. Goods									
1. Medical Equipment	4,024	-	-	-	-	-	-	-	4,024
	(4,024)								(4,024)
2. Office & Other Equip.	-	-	-	-	233	-	-	-	233
					(233)				(233)
3. Furniture	-	1,238	-	-	-	-	-	-	1,238
		(1,238)							(1,238)
4. Pharmaceuticals	2,751	-	-	-	-	104	-	-	2,855
	(2,751)					(104)			(2,855)
C. Consultant Services									
1. Design and Supervision	-	-	-	1,328	-	-	-	-	1,328
				(1,328)					(1,328)
2. Technical Assistance									
Firms	-	-	-	24	-	-	-	-	24
				(24)					(24)
Individual Consultants	-	-	184	232	-	-	-	125	541
			(184)	(232)					(416)
D. Training	-	-	-	-	-	-	1,862	-	1,862
							(1,862)		(1,862)
E. Operating Costs /b	-	-	-	-	-	-	105	-	105
							(105)		(105)
Total	6,776	14,153	184	1,583	233	104	1,967	1,925	26,925
	(6,776)	(14,153)	(184)	(1,583)	(233)	(104)	(1,967)	-	(25,000)

Note: Figures in parenthesis are the respective amounts financed by Trust Fund
\a Total estimate includes temporary facilities (financed by MOH) to be used as substitutes until the rehabilitation of the Emergency Units is completed
\b Project management costs

ANNEX 3: PROJECT MANAGEMENT

A. Project Management Structure



B. Responsibility Matrix

No.	Activities	Agencies/Bodies Involved							
		MOF	MOH	PMT	DIR	HOS	AUD	PRO	WB
1.00	Financial Management								
1.01	Make available funds from own resources		E	N					N
1.02	Launch Workshop	N	E	E					E
1.03	Document Accounting, Reporting & Auditing Procedures	N	N	E					R
1.04	Appoint Project Auditor (external)	N	E	R					R
1.05	Appoint Consultants [2]			E					R
1.06	Remit Specimen of signatures	N	E	N					N
1.07	Request for reimbursement of own funds from the WB	N	N	E					R
1.08	Prepare requests for Direct payments	N	R	E					
1.09	Review claims and authorize payments		N	N					E
1.10	Make payments within 10 days of payment authorization		N	N					E
1.11	Monitor payments for timeliness			E					N
1.12	Keep project accounts		E	E					
1.13	Prepare monthly Financial reports	N		E					N
1.14	Supervise FM aspects	N	N	N					E
2.00	Planning, Monitoring & Evaluation								
2.01	Establish project preparation, implementation, technical monitoring (supervision) & reporting procedures at center and at the Directorate level		N	E	S			S	R
2.02	Review PMT's procurement procedures		E	N	N		S	S	
2.03	Conduct Annual audits	R	R	S	S		E		R
2.04	Review implementation progress		E	N	N			S	
2.05	Review Technical Documentation and Contracts		N	S	S			E	
2.06	Compare Project Estimates with Actual Prices		N	E	S		N	S	
2.07	Recommend improvements to quality of construction		N	N	N			E	
2.08	Follow up on environmental mitigation measures		S	E	S	E			N
2.09	Review timeliness of implementation		N	S	S	N			N
2.10	Conduct site visits to assess progress of work and quality			E	S			S	
2.11	Prepare Quarterly Progress Reports for the MOH and the World Bank	N	N	E	S				R

[2] Financial Management consultants

No.	Activities	Agencies/Bodies Involved							
		MOF	MOH	PMT	DIR	HOS	AUD	PRO	WB
3.00	Procurement								
3.01	Prepare and revise a Procurement Plan in consultation with each Directorate Governorate		A	E	S			S	A
3.02	Appoint Consultants [3]	N	R	E	S				R
3.03	Establish a procurement monitoring system at the MOH		R	R				E	R
3.04	Prepare simplified bidding documents for shopping procedures for smaller contracts		R	R	S			E	R
3.05	Prepare and revise a project implementation manual		R	E	S	S	S	S	R
3.06	Prepare Standard Bidding Documents for Works and Goods		R	R	S			E	R
3.07	Prepare specific contract documents for each hospital package lot.		N	E	E			S	R
3.08	Invite bids quotes		N	E	E		N	N	
3.09	Evaluate bids			E / R	E			S	R
3.10	Obtain WB No objection if required		N	E	.				
3.11	Award and sign contracts	N	N	E	E		N	S	
3.12	Monitor progress of works under construction		S	E	S	S	S	S	
3.13	Conduct physical inspection of completed hospitals			E	E			S	
3.14	Coordinate procurement training to MOH and PMT staff	N	N	E				S	N
3.15	Conduct training on procurement to Iraqi staff	N	N	N	N			E	
3.16	Keep records on procurement for all projects. Directorate will keep a copy of its project.			E	S				
3.17	Follow up on complains		N	E	S				N
3.18	Conduct post review								E

Key:
R=Review/Clear E=Execute S=Support A=Approve N=Notified

Legend:
MOF: Ministry of Finance; **MOH**: Ministry of health; **MOH-PMT**: Project Management Team (in MOH); **DIR**: Directorate of Health at Governorate level; **HOS**: Hospital; **AUD**: Financial Auditor; **PRO**: Procurement Consultant (in the case of civil works, PRO includes the private consultants hired to prepare construction documents and provide design & supervision services); **WB**: World Bank (Administrator of the Trust Fund)

[3] Consultants hired to prepare design, construction documents and administration of the contract and supervision of the works during construction.

ANNEX 4 : PROCUREMENT ARRANGEMENTS AND PROCUREMENT PLAN

I. GENERAL

1. Project information:

Country:	Republic of Iraq
Recipient:	Ministry of Health
Project Name:	Emergency Health Rehabilitation Project
Project No.:	P091305
Grant Amount:	US$25 million from the World Bank Iraq Trust Fund
Project Implementing Agency (PIA):	Ministry of Health

2. Bank's approval Date of the Procurement Plan: October 7, 2004

3. Date of General Procurement Notice: November 3, 2004

4. Period covered by this procurement plan: 18 months.

II. GOODS AND WORKS AND NON-CONSULTING SERVICES.

1. Prior Review Threshold: Procurement Decisions subject to Prior Review by the Bank as stated in Appendix 1 to the Guidelines for Procurement:

	Procurement Method	Prior Review Threshold	Comments
1.	ICB (Goods)	All	
2.	Shopping (Goods, Works)	First three purchase orders/contracts All >=US$100,000	See Procurement Plan for selected contracts
3.	NCB (works, goods)	First three contracts regardless of value; and all contracts >= US $ 250,000 per contract for works and >= US $ 100,000 per contract for goods	See Procurement Plan for selected contracts
4.	Direct Contracting/Purchase	All	

2. Reference to Project Implementation Manual

The Project Management Team (MOH-PMT) will prepare a simple Project Implementation Manual (PIM) by December 2004. The PIM will be adapted to conform to the Master Implementation Manual (MIM) when it is finalized. The MIM is being prepared by an international consulting firm financed under the capacity building trust fund for Iraq, and is planned to be finalized by December 2004.

3. Any Other Special Procurement Arrangements

Not applicable

4. Procurement Packages with Methods and Time Schedule

It is not expected that international contractors would be interested in the works contracts under this project, especially under the current security situation in Iraq and the scattered locations of the subprojects. Thus, no contract is expected to be procured using ICB procedures. There is no domestic preference under the project. A detailed procurement plan is included in this annex.

III. SELECTION OF CONSULTANTS

1. Prior Review Threshold: Selection decisions subject to Prior Review by Bank as stated in Appendix 1 to the Guidelines Selection and Employment of Consultants:

	Selection Method	Prior Review Threshold	Comments
1.	Services from firms or individuals	First three contracts regardless of value.	
1.	Competitive Methods (Firms)	>=US$100,000	
2.	Single Source (Firms)	All	
3.	Individual Consultants	>=US$50,000	
4.	Single Source (individual)	All	

2. Short list comprised entirely of national consultants

A short list of consultants for services, estimated to cost less than US$100,000 equivalent per contract, may be comprised entirely of national consultants in accordance with the provisions of paragraph 2.7 of the Consultant Guidelines.

3. Any Other Special Selection Arrangements

The selection of a procurement consulting firm will be based on Consultants' Qualifications (CQs). The security conditions in Iraq may not attract international consultants to work in Iraq. It is also expected that international consulting firms may not be interested in the preparation of hospital rehabilitation bidding documents and construction supervision of the hospitals while the security situation is volatile. Based on this, short lists for all consulting services for engineering services and bidding document preparation and construction supervision of hospitals may be composed entirely of national consulting firms. The method for selection of these consulting firms is proposed to be CQs to speed up the implementation of the project. It is also expected that consulting offices associated with local universities may be included in the short lists. University-based consultants shall not have preference over private consultants.

4. Consultancy Assignments with Selection Methods and Time Schedule

These are indicated in the attached procurement plan.

IV. IMPLEMENTING AGENCY CAPACITY BUILDING ACTIVITIES WITH TIME SCHEDULE

The agreed Capacity Building Activities are listed with time schedule.

Expected Outcome / Activity Description	**Estimated Cost (US$)**	**Estimated Duration**	**Start Date**	**Comments**
Training and support to MOH on: procurement, setting up a procurement monitoring system, filing system, bidding document preparation, bid evaluation, preparation of RFP, proposal evaluation, reporting and spot physical inspection. Three workshops outside Iraq will be designed as follows: 1. Document preparation, RFP preparation, Bid/RFP invitation, Bid/proposals opening procedures (1 week). 2. Bid evaluation, proposals evaluation, awarding contracts (1 week). 3. Contract Administration/Supervision (1 week). One workshop for contractors and one for consultants in Iraq will be planned on bid preparation and proposals preparation, respectively.	200,000	18 months	Jan. 2005	International consulting firm with local Iraqi staff in Iraq. Most workshops would be conducted outside Iraq until security conditions have improved.
A pharmaceutical procurement consultant is to be hired by the MOH to conduct assessment of the procurement of drugs and medical equipment and the organizational structure of procurement system within the MOH and KIMADIA and recommend options for improving the pharmaceutical supply chain in Iraq.	50,000	1 month	Jan. 2005	An individual international consultant will be hired by MOH. He/she will be conducting the assessment through meetings with the MOH staff outside Iraq. A local consultant could be hired to assist the international consultant in conducting this activity.

Initial Procurement Plan for Works and Goods

As Agreed with the PMT on October 7, 2004

Sl. #	Procurement System Ref. #	Location/ Description	Estimated Cost (US$) /c	Estimated No. of Packages	Procurement Method	Review By Bank (PRIOR / Post)	Invita-tion Date	Expected Bid-Opening Date	Contract Award Date	Start Date	Comple-tion Date
	A	B	C	D	E	F	G	H	I	J	K
1	**1. WORKS**										
2	**1.1 Rehabilitation of Emergency Units**										
3	EHRP.WR.NCB.A-1.BAG.SD	Baghdad (SD)/ Al Yarmouk T.H.	$ 1,932,000	1	NCB	**PRIOR**	23-May-05	22-Jun-05	1-Aug-05	8-Aug-05	23-May-06
4	EHRP.WR.NCB.B-1.BAG.SD	Baghdad (SD)/ Al Kindy T.H.	$ 1,369,000	1	NCB	**PRIOR**	8-Jun-05	8-Jul-05	15-Aug-05	22-Aug-05	22-Apr-06
5	EHRP.WR.NCB.B-2.BAG.K	Baghdad (K)/ Al Karkh G.H.	$ 1,185,000	1	NCB	**PRIOR**	22-Jun-05	22-Jul-05	31-Aug-05	8-Sep-05	8-May-06
6	EHRP.WR.NCB.C-1.DIY	Diyala/ Baquba G.H	$ 1,188,000	1	NCB	**PRIOR**	8-Jul-05	8-Aug-05	15-Sep-05	22-Sep-05	22-Apr-06
7	EHRP.WR.NCB.D-1.SD	Baghdad(SD)/ Al Imam Ali G.H.	$ 1,027,000	1	NCB	**PRIOR**	22-Jul-05	21-Aug-05	30-Sep-05	8-Oct-05	8-Apr-06
8	EHRP.WR.NCB.D-2.KIR	Kirkuk/ Kirkuk G.H.	$ 750,000	1	NCB	**PRIOR**	22-Jul-05	21-Aug-05	30-Sep-05	8-Oct-05	8-Apr-06
9	EHRP.WR.NCB.D-3.MIS	Missan/ Amara G.H.	$ 750,000	1	NCB	**PRIOR**	7-Aug-05	7-Sep-05	15-Oct-05	22-Oct-05	22-Apr-06
10	EHRP.WR.NCB.D-4.KAR	Karbala/ Al Hussein G.H.	$ 1,031,000	1	NCB	**PRIOR**	7-Aug-05	7-Sep-05	15-Oct-05	22-Oct-05	22-Apr-06
11	EHRP.WR.NCB.D-5.ANB	Anbar (Ramadi)/ Al Ramadi T.H.	$ 1,031,000	1	NCB	**PRIOR**	22-Aug-05	22-Sep-05	31-Oct-05	7-Nov-05	7-May-06
12	EHRP.WR.NCB.D-6.SAL	Salah Al Din/ Samarra G.H.	$ 950,000	1	NCB	**PRIOR**	22-Aug-05	22-Sep-05	31-Oct-05	7-Nov-05	7-May-06
13	EHRP.WR.NCB.D-7.ERB	Erbil/ Rizgari T.H.	$ 750,000	1	NCB	**PRIOR**	8-Sep-05	8-Oct-05	15-Nov-05	22-Nov-05	22-May-06
14	EHRP.WR.NCB.D-8.SUL	Sulaymanyiah/ Jumhouri G.H.	$ 950,000	1	NCB	**PRIOR**	8-Sep-05	8-Oct-05	15-Nov-05	22-Nov-05	22-May-06
15	**Subtotal 1.1**		**$12,913,000**	12							
16	**Total 1. for works**		**$12,913,000**	12							

Sl. #	Procurement System Ref. #	Location/ Description	Estimated Cost (US$) /c	Estimated No. of Packages	Procurement Method	Review By Bank (PRIOR / Post)	Invitation Date	Expected Bid-Opening Date	Contract Award Date	Start Date	Completion Date
	A	B	C	D	E	F	G	H	I	J	K
17	**2. GOODS**										
18	**2.1 Essential Emergency Drugs for 12 Hospitals (37 items, total quantity 1,412,267 items)**										
19	EHRP.EED.DC	Baghdad/ 1 Emergency Drug, total Q=427	$ 104,000	1	DC	**PRIOR**	15-Dec-04	30-Dec-04	1-Feb-05	8-Feb-05	31-May-05
20	EHRP.EED.ICB	Baghdad/ 36 Emergency Drugs, total Q=1,411,840	$ 2,750,000	1	ICB	**PRIOR**	15-Dec-04	15-Jan-05	7-Mar-05	15-Mar-05	5-Jul-05
21	**Subtotal 2.1**		**$ 2,854,000**	2							
22	**2.2 Medical Equipment for 12 Hospitals**										
23	EHRP.MEDEQ.ICB	20 Items, total Q=1,295 items	$ 4,024,000	8	ICB	**PRIOR**	15-Dec-04	31-Jan-05	23-Mar-05	1-Apr-05	22-Jul-05
24	**Subtotal 2.2**		**$ 4,024,000**	8							
25	**2.3 Office Equipment, Computers and Vehicles**										
26	EHRP.OFFEQUIP.SHP	Office Equipment & Computers	$ 192,000	4	SH	**PRIOR**	15-Dec-04	22-Dec-04	28-Jan-05	5-Feb-05	7-Mar-05
27	EHRP.VEH.NCB	3 Vehicles	$ 41,000	1	NCB	*Post*	1-Dec-04	15-Dec-04	31-Dec-04	8-Jan-05	8-Apr-05
28	**Subtotal 2.3**		**$ 233,000**	5							
29	**2.4 Furniture for 12 Hospitals**										
30	EHRP.FURN.NCB	Furniture	$ 1,238,000	12	NCB	**PRIOR**	15-Dec-04	15-Jan-05	7-Mar-05	15-Mar-05	15-Jun-05
31	**Subtotal 2.4**		**$ 1,238,000**	12							
32	**Total for 2. GOODS**		**$ 8,349,000**	27							
33	**GRAND TOTAL**		**$21,262,000**	39							

Notes: All cost figures are totals including contingencies

Initial Procurement Plan for Consultant's Services

As Agreed with the PMT on October 7, 2004

Sl. #	Procure-ment System Ref. #	Location/ Description of Assignment	Estimated Cost (US$)	Selec-tion Method	Review by Bank Prior / Post	Adverti-sement for EOI Date	Expected Proposal Submission Date	Contract Award Date	Start Date	Comple-tion Date
	A	B	C	D	E	F	G	H	I	J
1	**3. CONSULTANTS' SERVICES**									
2	**3.1 Consultants for Project Management (PMT Team) & Auditing**									
3	EHRP.CON.CQS.PROC	Procurement Training & Support (International Firm)	$ 232,000	CQS	**PRIOR**	30-Oct-04	21-Dec-04	28-Jan-05	1-Feb-05	1-Feb-06
4	EHRP.CON.IC.PMT	5 PMT Consultants (18 month consultancies)	$ 127,000	IC	**PRIOR**	20-Oct-04	4-Nov-04	8-Dec-04	15-Dec-04	15-Jun-06
5	EHRP.CON.IC.DRUGS	International Consultant to assist in drug supply chain	$ 56,000	IC	**PRIOR**	30-Oct-04	6-Dec-04	8-Jan-05	13-Jan-05	12-Jun-05
6	ESCRP.CQS.AUDIT	External Audit (Local Firm)	$ 24,000	CQS	**PRIOR**	1-Jan-04	16-Jan-04	7-Feb-04	15-Feb-04	30-Jun-06
7	**Subtotal for 3.1**		**$ 439,000**							
8	**3.2 Design & Supervision Services for the 12 Emergency Units**									
9	EHRP.CON.CQS.A-1.BAG.SD	Baghdad/SD Al Yarmouk T.H.	$ 199,000	CQS	**PRIOR**	1-Nov-04	30-Nov-04	31-Dec-04	1-Jan-05	31-May-06
10	EHRP.CON.CQS.B-1.BAG.SD	Baghdad (SD)/ Al Kindy T.H.	$ 141,000	CQS	**PRIOR**	1-Nov-04	15-Dec-04	15-Jan-05	16-Jan-05	30-Apr-06
11	EHRP.CON.CQS.B-2.BAG.K	Baghdad (Karkh)/ Al Karkh G.H.	$ 122,000	CQS	**PRIOR**	1-Nov-04	31-Dec-04	31-Jan-05	1-Feb-05	15-May-06
12	EHRP.CON.CQS.C-1.DIY	Diyala/ Baquba G.H	$ 122,000	CQS	**PRIOR**	1-Nov-04	15-Jan-05	15-Feb-05	16-Feb-05	30-Apr-06
13	EHRP.CON.CQS.D-1.BAG.SD	Baghdad (SD)/ Al Imam Ali G.H.	$ 106,000	CQS	**PRIOR**	1-Nov-04	31-Jan-05	28-Feb-05	1-Mar-05	15-Apr-06
14	EHRP.CON.CQS.D-2.KIR	Kirkuk/ Kirkuk G.H.	$ 77,000	CQS	*Post*	1-Nov-04	31-Jan-05	28-Feb-05	1-Mar-05	15-Apr-06
15	EHRP.CON.CQS.D-3.MIS	Missan/ Amara G.H.	$ 77,000	CQS	*Post*	1-Nov-04	15-Feb-05	15-Mar-05	16-Mar-05	30-Apr-06
16	EHRP.CON.CQS.D-4.KAR	Karbala/ Al Hussein G.H.	$ 106,000	CQS	**PRIOR**	1-Nov-04	15-Feb-05	15-Mar-05	16-Mar-05	30-Apr-06
17	EHRP.CON.CQS.D-5.ANB	Anbar (Ramadi)/ Al Ramadi T.H.	$ 106,000	CQS	**PRIOR**	1-Nov-04	28-Feb-05	31-Mar-05	1-Apr-05	15-May-06
18	EHRP.CON.CQS.D-6.SAL	Salah Al Din/ Samarra G.H.	$ 98,000	CQS	*Post*	1-Nov-04	28-Feb-05	31-Mar-05	1-Apr-05	15-May-06
19	EHRP.CON.CQS.D-7.ERB	Erbil/ Rizgari T.H.	$ 77,000	CQS	*Post*	1-Nov-04	15-Mar-05	15-Apr-05	16-Apr-05	31-May-06
20	EHRP.CON.CQS.D-8.SUL	Sulaymanyiah/ Jumhouri G.H.	$ 98,000	CQS	*Post*	1-Nov-04	15-Mar-05	15-Apr-05	16-Apr-05	31-May-06
21	**Subtotal 3.2**		**$ 1,329,000**							
22	**GRAND TOTAL**		**$ 1,768,000**							

Notes: All cost figures are totals including contingencies

ANNEX 5: FINANCIAL MANAGEMENT AND DISBURSEMENT

1. The project financial resources will be managed within the framework of the Iraqi public financial management system. The grant funds will be made available to the MOH, which, assisted by the MOH-PMT, will enter into contractual agreements with construction companies and contractors, consultants, and vendors for the rehabilitation and construction activities financed under the project.

2. Due to the security risk, the project financial management assessment was carried out in Amman by interviewing Iraqi officials from MOH, and reviewing sample of documents used in the financial management of the ministry. These interviews concentrated on: (i) identifying the applicable procedures to introduce the grant proceeds as a supplement to the MOH budgets (ii) assessing the current financial management practices at the MOH in order to identify the risks associated with the control environment and the accounting, reporting and auditing procedures in place; and (iii) proposing actions to reduce and manage such risks. Despite the limited knowledge of the Recipient's systems and processes, this assessment showed that the systems in place at MOH are based on principles and procedures defined by the legal framework and operational decrees applicable to the public sector. The current control environment and accounting systems would require strengthening and close monitoring in order to allow proper use of funds and timely generation of monitoring reports[4].

I. Financial Management Risk Assessment

3. The financial management risk associated with this operation is considered high. Critical risk factors are: (i) ongoing insecurity, which prevents on-site Bank supervision and assessments, including financial management assessments; (ii) the Bank's limited knowledge of Iraq's public financial management systems, controls, and procedures; (iii) the limited knowledge on the part of Iraqi authorities of Bank policies and guidelines; (iv) the possibility of MMPW not making available on a timely basis financial resources to honor payments below the value of US$10,000; (v) difficult communication and flow of information between worksites and the PMT, which could delay payments; (vi) inefficiencies in Iraq's banking system that delay payments and transfer of funds to contractors, suppliers, or MMPW; and (vii) variation order requests that may exceed price contingencies and difficulties may be encountered in verifying justification for variation orders. Although the project design mitigates to the extent possible these risks, the project will require close monitoring and supervision during implementation. A detailed risk assessment may be found in Section VII.

II. Risk Mitigation Measures

4. The overall high risk will be partially mitigated by putting in place additional controls and appropriate procedures.

5. The control risks will be mitigated as follows: (i) the MOH-PMT will verify and authorize payments under the project; and verify justifications for variation orders (ii) the MOH-

[4] A special-purpose audit conducted by an international firm of selected Iraqi ministries had identified major irregular financial transactions and significant control breaches.

PMT will assign competent financial staff from the MOH who will be supported, as needed, by expert financial management consultants; (iii) the MOH will identify the qualified staff from the MOH finance department, including the internal auditor, who will track the project activities; (iv) the PMT will use a full accounting process for the project, through a stand-alone simplified accounting and reporting system (in addition to the MOH Accounting Department); (v) all invoices/claims above US$10,000 will be paid through direct payments, while payments made by MOH will be reimbursed by the Bank upon submission of appropriate documents to the Bank; (vi) the fiduciary Monitoring Agent will review project expenditures and withdrawal applications; and (vii) the project financial statements will be audited by an international audit firm acceptable to the Bank, in addition to the regular audit conducted by the Government Supreme Audit Institution. Application of these mitigation measures will help ensure that the MOH team will be able to monitor the project transactions according to Bank requirements and grant agreement provisions.

6. The accounting and reporting risks will be managed by putting in place a simple parallel accounting system capable of recording all project expenditures and monitoring the project commitments at any point during the implementation period, as well as generating project reporting, including the Bank-required Financial Monitoring Reports (FMRs). The project accounting system will be installed after the project is declared effective, as the grant funds will finance this system.

7. All the above activities and procedures will be documented in a separate chapter of the Project Implementation Manual which will be in line with the Master Implementation Manual.

III. Financial Management Arrangements

8. Accounting System. MOH currently uses a manual accounting system. To avoid the risk of not generating timely reports for project management and monitoring purposes, parallel arrangements will be implemented to overcome this shortcoming. The project accounting and reporting activities will be undertaken by the PMT but in conjunction with MOH control procedures and applicable laws. A simple computerized spreadsheet accounting system will be used to track the grant accounts and generate reports including the Financial Monitoring reports (FMRs). The PMT staff will include a financial officer and an accountant assisted by a financial management consultant.

9. Flow of Information. As per current control regulations, all invoices or work orders will be signed and approved by the planning departments of individual governorates and will be remitted to MOH-PMT for payment under cover letter signed by the MOH directorate at the governorate level. Contracting and payment processes will be centralized at the PMT level. The PMT will verify all claims and will maintain up-to-date invoice register and general ledger to record all payments incurred. The MOH internal auditor designated to the project by the Minister will perform ex-ante checking to all financial transactions.

10. Financial Management Procedures. The project financial management procedures and the parallel accounting system will be described in details in a chapter of the project implementation Manual which will be in line with the Master Implementation Manual under preparation by the Bank. The PMT assisted by an external consultant will prepare this manual.

IV. Project Reports

11. Project reports should be remitted to the Bank following the agreed format and frequency. The proposed format of the reports is in the project files and was agreed upon with the MOH representatives during negotiations.

12. **Quarterly Reports.** The MOH will generate Financial Monitoring Reports (FMRs) and submit them to the Bank as part of the project progress report, or separately, within 45 days from the end of the quarter. These FMRs include two sections:

- **Financial Reports**: to include a cash flow statement, beginning and ending project cash balances and an expenditure report by activity or contract comparing actual and planned expenditures. Also, a narrative report explaining major variances when compared to plan and the proposed corrective actions should be included as an annex to the financial reports.

- **Contracts Reports**: to include information on the major rehabilitation and construction contracts, showing contract financial status against plan, including information on all authorized contract variations.

13. **Annual Reports.** Audited Project Financial Statements that will be submitted to the Bank, no later than six months after the end of the fiscal year, include:

a. Statement of sources and utilization of funds, indicating funds received and expenditures.
b. Appropriate schedules classifying project activities, showing cumulative balances.
c. Statement of payments made using statements of expenditures procedures, if allowed later by the Bank, as defined in the legal agreement.

V. Auditing Arrangements

14. An external independent auditor with international experience will be engaged to perform the project audit and issue an independent opinion on the project financial statements. The external audit report will encompass all of the project's activities and will be presented in accordance with internationally accepted auditing standards. MOH will remit a project audit report to the Bank not later than four months after the end of the government fiscal year and following the closing date of the Grant. The auditor selection process will be launched directly after the grant agreement is signed. In addition to the audit reports, the auditor will prepare a "management letter" identifying any observations, comments, and deficiencies in the system and controls that the auditor considers pertinent, and will provide recommendations for their improvements. The audit will cover the expenditures made through direct payments as well as expenditures reimbursed to the MOH, in terms of their substantiation and their eligibility and compliance with the grant agreement. An escrow account will be used to pay the auditor after the project closing date.

VI. Disbursement Arrangements

15. The Bank's strategy in Iraq is to implement projects though the Iraqi ministries (rather than stand alone PIUs), working together to strengthen the ministries' controls, while at the same

time putting in place other measures to provide assurance such as independent monitoring agents, technical support and supervision arrangements. As a further compensating control, disbursements will be made primarily through direct payments by the Bank to the contractors, consultants and vendors. Direct payment applications will be prepared by the MOH-PMT and submitted to the Bank through the MOH. Authorized signatories, names and corresponding specimens of their signatures will also be submitted to the Bank.

16. The project management component costs and payments below the threshold of US$10,000 will be honored through payments made available by the recipient of the grant from its own resources. These payments made from the recipient's own resources will be reimbursed, on a periodic basis, by the Bank to the MOH upon presentation of a proof of payment and a signed withdrawal application. The MOH-PMT and the main financial counterparts from MOH will receive intensive training in Bank disbursement procedures.

17. **Allocation of Grant Proceeds**. The proceeds of the Grant will be disbursed in accordance with the Bank's guidelines. The proposed Project has been designed to be implemented over a 24-month period. The disbursement arrangements are based on the Bank's appraisal of the financial management capability of the implementing ministry, as well as the experience and lessons learned from current and previous projects in the region. Grant funds are expected to be fully disbursed by the Project Closing Date of December 31, 2006. The disbursement categories and amounts and percentages to be financed under each category are presented in Table A.

Table A: Allocation of Grant Proceeds

Expenditure Category	Amount in US$ Thousand	Financing Percentage
1. Civil Works	11,600	100%
2. Goods	7,500	100%
3. Consultant Services	1,600	100%
4. Training	1,700	100%
5. Incremental Operating Costs	100	100%
6. Unallocated	2,500	
TOTAL	25,000	

18. Use of Statements of Expenditure. Initially, supporting documentation will be provided to the Bank for all requests to disburse funds under the Grant. The Bank has the option to allow expenditures under US$10,000 to be made by means of Statements of Expenditures (SOEs). If SOEs are allowed, the supporting documentation will be maintained at the MOH and made available for review by the project auditors and the Bank representatives upon request; any documentation relating to SOEs will be retained for up to one year from the date the Bank receives the second grant audit report.

VII. Financial Management Risk Assessment

19. The following two tables summarize the detailed financial management and operational risk assessment for the project.

Financial Management identified risks	Risk Rating	Risk Mitigation Measures
Limited knowledge of financial management capacity in the MOH.	H	The Bank gained some knowledge on Iraqi Public Financial Management (PFM) system by appointing a consulting firm to assess the financial management capacity of several Iraqi ministries. Bank staff also conducted their own interviews with Iraqi officials in Amman and reviewed PFM system documentation. Further knowledge was gained from an audit report issued by an international audit firm
Limited capacity to manage financial management requirements of the Project.	H	The PMT will be staffed with financial officers, including a qualified financial manager, a financial officer, and a finance assistant. The financial manager will manage disbursements from the proceeds of the grants, managed and supervise project accounts, retain financial records, and prepare project reports.
Lack of familiarity with Bank guidelines and regulations in MOH.	H	Training will be provided to MOH and MOH-PMT staff on Bank policies and guidelines.
Difficulties in making payments to suppliers inside and outside Iraq; possible risks associated with Iraq banking sector.	H	All major payments will be made through direct payment. Inefficiencies in the banking and payment system in Iraq remain a major risk factor for such payments. The Bank uses an international commercial bank for US$ payment in Iraq. Also the Bank discussed with international commercial banks their abilities to transfer funds into Iraqi Banks
Staffing: Lack of financial management skills in MOH-PMT.	H	The financial management team will be assisted by a financial management consultant.
Accounting policies and procedures: may not meet Bank management and reporting requirements.	M	The Financial Operations chapter of the Project Implementation Manual will define financial policies and procedures specific to the project. The financial management policies of the MOH will apply to the project
The MOH not being able to provide funds from its own resources to cover expenditures below US$10,000.	H	The minister's commitment to provide the funds was provided during negotiations.
Internal audit: Existing arrangements for internal audit are not adequate and officials may not be familiar with project requirements.	M	The Minister will assign one internal auditor to focus on the project transactions and will report to the Minister. This auditor will be introduced to the project and receive training on Bank guidelines in the PMT Training Workshop.
External audit: Unknown capacity of auditing firms in Iraq. There was no capacity assessment for the audit profession in Iraq to determine capability to perform audits as per ISA.	H	External audit will be carried out by an independent auditor with international experience under terms of reference acceptable to the Bank..
Reporting and Monitoring: Current MOH systems do not generate required reports.	H	A "ring-fenced" project accounting system, initially based on spreadsheet applications, will generate the data for the FMRs.

Information systems: Not functioning reliably in MOH	H	Simple spreadsheet-based reporting format has been agreed upon.
Difficulty in verifying justification for variation orders and possibility of variation orders exceeding price contingencies.	H	PMT will be responsible for verifying variation orders. The fiduciary monitoring agent will assist, to the extent feasible. Price contingencies have been calculated on the basis of recent prices. Given the volatility of the market, however, should price contingencies be insufficient to cover the variation orders, scope of work will be scaled back.
Overall Risk	**H**	

Operational Risk	**Risk mitigating measures**
Identifying the hospitals in which the emergency rooms will be rehabilitated.	Selection criteria were identified
The effects of the rehabilitation process on the daily ongoing operation in hospitals especially in conflict areas.	The emergency rooms will be moved to temporary substitute locations within the hospitals
Proper identification of the required equipment to be used in the rehabilitated emergency rooms	The MOH staff prepared a list of the priority equipment and discussed with the WB staff
Proper usage/maintenance plans for the equipment to ensure functionality and effectiveness.	The suppliers will provide adequate training for the items procured.
Ability to determine the condition of the received items.	The Technical Committee will assign the proper staff to inspect items received. .
Identifying the essential drugs.	MOH staff will determine the needed items from the classified list developed internally.
Proper storage and distribution of the drugs.	MOH has provided assurance that the drugs will be properly stored and distributed according to the agreed Project implementation arrangements.
The selection process of MOH staff to attend training programs.	MOH and the selected hospitals will nominate the staff for training.

VIII. Bank Financial Management Supervision

20. The first supervision mission after effectiveness will take the form of a project launch workshop where further training on Bank rules, regulations and guidelines will be provided. A high level of supervision will be required initially in order to ensure that the MOH-PMT and the qualified staff from the MOH finance department are well-trained in the use of Bank guidelines and procedures. Until security conditions make travel to Iraq possible for Bank staff, the Bank will employ a Monitoring Agent, an independent firm that will operate in Iraq and support the Bank in carrying out its financial management supervision function.

ANNEX 6: Results-Based Supervision Plan
(Expected Project Outputs)

Rehabilitation of 12 Emergency Units in 9 Governorates

Pckg #	Activity Description	Target Dates (dd/mmm/yy)		Estimated Values (US$x.xx million)	
		Plan	Actual	Plan	Actual
A-1	*Al Yarmouk T.H. (Baghdad/Sader City)*				
(a)	Works Contract Awarded	01-Aug-05		1.93	
(b)	Emergency Unit Rehabilitated	23-May-06		-	
B-1	*Al Kindy T.H (Baghdad/Sader City)*				
(a)	Works Contract Awarded	15-Aug-05		1.37	
(b)	Emergency Unit Rehabilitated	22-Apr-06		-	
B-2.	*Al Karkh G.H (Baghdad/Karkh)*				
(a)	Works Contract Awarded	31-Aug-05		1.18	
(b)	Emergency Unit Rehabilitated	08-May-06		-	
C-1	*Baquba G.H. (Diyala)*				
(a)	Works Contract Awarded	15-Sep-05		1.19	
(b)	Emergency Unit Rehabilitated	22-Apr-06		-	
D-1.	*Al Imam Ali G.H. (Baghdad/Sadir)*				
(a)	Works Contract Awarded	30-Sep-05		1.03	
(b)	Emergency Unit Rehabilitated	08-Apr-06		-	
D-2.	*Kirkuk G.H. (Kirkuk)*				
(a)	Works Contract Awarded	30-Sep-05		0.75	
(b)	Emergency Unit Rehabilitated	08-Apr-06		-	
D-3.	*Amara G.H. (Missan)*				
(a)	Works Contract Awarded	15-Oct-05		0.75	
(b)	Emergency Unit Rehabilitated	22-Apr-06		-	
D-4.	*Al Hussein G.H. (Karbala)*				
(a)	Works Contract Awarded	15-Oct-05		1.03	
(b)	Emergency Unit Rehabilitated	22-Apr-06		-	
D-5.	*Al Ramadi G.H. (Anbar)*				
(a)	Works Contract Awarded	31-Oct-05		1.03	
(b)	Emergency Unit Rehabilitated	07-May-06		-	
D-6.	*Samarra G.H. (Salah El Din)*				
(a)	Works Contract Awarded	31-Oct-05		0.95	
(b)	Hospital Rehabilitated	07-May-06		-	
D-7.	*Rizgari G.H. (Erbil)*				
(a)	Works Contract Awarded	15-Nov-05		0.75	
(b)	Emergency Unit Rehabilitated	22-May-06		-	
D-8.	*Jumhouri G.H. (Sulaimanyiah)*				
(a)	Works Contract Awarded	15-Nov-05		0.95	
(b)	Emergency Unit Rehabilitated	22-May-06		-	

ANNEX 7: ENVIRONMENTAL AND SOCIAL SCREENING AND ASSESSMENT FRAMEWORK

Introduction. The Environmental and Social Screening and Assessment Framework (ESSAF) will provide the general policies, guidelines, codes of practice and procedures to be integrated into the implementation the project (see Appendix A).

Potential Adverse Impact. The activities supported by the project comprise rehabilitation and expansion of hospital facilities. Potential adverse environmental impacts (summarized below) are restricted in scope and severity:

- Dust and noise due to demolition and construction;
- Dumping of demolition and construction wastes and accidental spillage of machine oil, lubricants, etc;
- Risk for inadequate use of hazardous anti termite chemicals during foundation works;
- Risk for inadequate handling of hazardous wastewater, waste gases and spillages of hazardous material during operation of the hospitals; and
- Risk from inadequate handling of medical waste.

Handling of Medical and Non-medical Wastes. The inadequate handling and disposal of medical wastes may lead to transmission of HIV, hepatitis, meningitis, and other infectious diseases through injuries caused by syringe needles contaminated by human blood. The groups most at risk are medical care workers, waste management operators, and scavengers. The management of medical wastes requires diligence and care from a chain of people, starting with medical care staff, continuing through collection workers, and finishing with disposal operators.

It would be the responsibility of MOH to provide training courses for all staff involved in the management of medical wastes to make them aware of hazards, especially from infected sharps, as well as to educate patients and visitors on proper hygiene and cleanliness with respect to waste. Public awareness campaigns should be held at the community level. The training of personnel should not solely explain routine procedures, but should also cover emergency procedures, such as what action should be taken as a result of a spillage of particular types of waste, or in the case of an injury involving a needle. It would also be the responsibility of MOH to develop and monitor supplies and consumer policies which aim to minimize the level of waste generated as a result of the provision of services.

In order to ensure the safe and efficient handling and disposal of waste generated in the hospitals it will be necessary to develop operational policies. These should be based upon the central MOH principle of strict segregation between medical (clinical waste and sharps) and domestic waste and appropriate disposal of cytotoxic waste.

In order to be compliant with emerging guidelines and promote an environmentally-conscious approach to waste management, operational policies should also be based on the segregation of domestic waste into organic, non-organic and recyclable categories.

Hospital Waste Management Plans. The establishment of Hospital Waste Management Plans is not included in the proposed project for rehabilitation of Emergency Unit Buildings, but the issue should be considered in future projects for rehabilitation and upgrading of hospitals in Iraq. Factors that govern the hospital waste management strategies are the legislative and regulatory framework, and the waste treatment and disposal costs.

The medical waste should be collected by specialist contractors for treatment at central plants in each district, located at the hospital or elsewhere in the municipality. Because landfill operations may cause a loss of containment integrity and the dispersal of infectious waste, it is recommended that all infectious waste shall be treated prior to disposal. The following standards for waste management are recommended:

- Establishing standard operating procedures for each process used for treating infectious waste;
- Monitoring of all treatment processes in order to ensure efficient and effective treatment; and
- Using biological indicators to monitor treatment (other indicators may be used provided that their effectiveness has been successively demonstrated).

Recommended techniques for treatment of infectious waste are steam sterilization, incineration, microwave or ultraviolet heating systems, ionizing radiation or chemical treatment. The choice of technique depends on which category of infectious waste is being treated. Infectious waste that has been efficiently treated is no longer hazardous, and may therefore be mixed with and disposed of as ordinary solid waste, provided the waste does not pose other hazards that are subject to national regulations.

A Hospital Waste Management Plan should be based on the evaluation and implementation of the following strategic actions:

- Definition of waste management responsibilities and establishment of a waste management organization for the hospitals concerned, including provisions for decontamination services to other enterprises (hospitals, clinics and institutions);
- Provision of information, instruction and training of all staff involved in the waste management;
- Development of evaluation procedures for monitoring and quality assurance of the waste management;
- Identification and definition of categories of hospital waste;
- Characterization of hospital waste streams and estimate on quantities of hospital waste arisings (including waste streams for decontamination services to other hospitals, clinics and institutions);
- Development of a system for segregation of waste;
- Organization of dedicated facilities, services and transports on site for the implementation of segregation of hospital waste;
- Organization of the waste marshalling area including the adoption of an appropriate disinfection system for clinical waste (e.g., incinerator, microwave station);
- Organization of transport of waste off site and final disposal of hospital waste;
- Special treatment of hazardous waste water, exhaust air and waste gases;
- Development of procedures for handling accidents, incidents and spillages; and
- Assessment of the environmental impact and impact on public health.

The organization of transport of waste off-site and the final disposal of clinical waste are two of the most critical environmental aspects to be included in the Hospital Waste Management Plan.

ANNEX 7A: CODES OF PRACTICE FOR PREVENTION AND MITIGATION OF ENVIRONMENTAL IMPACTS

Potential Impacts	Prevention and Mitigation Measures
Water Supply • Repair and rehabilitation of existing piped water schemes. • New or expanded piped water schemes to serve fewer than 10,000 households. • Installation or rehabilitation of tubewells or dug wells.	
Disease caused by poor water quality: • contamination by seepage from latrines, municipal waste or agricultural areas. • high mineral concentrations. • creation of stagnant pools of water.	• Prioritize leak detection and repair of pipe networks. • Chemical and bacteriological testing of water quality from adjacent comparable sources prior to installation of new sources. • Redesign to prevent contamination if adjacent comparable sources are found to be contaminated. • Subsequent monitoring of installed or rehabilitated sources. • Appropriate location, apron and drainage around tubewells and dug wells to prevent formation of stagnant pools. • Provision of cover and hand-pump to prevent contamination of dug wells. • Where pit latrines are used they should be located more than 10m from any water source. The base should be sealed and separated by at least 2m of sand or loamy soil from the groundwater table. • Where nightsoil latrines or septic tanks are built they should be sealed. Outflows should drain either to a soak away located at least 10m from any water source or be connected to a working drain.

Potential Impacts	Prevention and Mitigation Measures
Social Risks: • Lack of clear division of rights/ responsibilities may result in maintenance problems of wells/pumps. • Lack of clear definition of user rights for wells and pumps may create exclusion of vulnerable groups. • Access to water may be captured by interest groups. • Use of foreign equipment/ materials may hinder maintenance of pumps/wells. • Potential impacts to cultural property.	• Ensure sufficient community participation and organization for effective planning and management of infrastructure. • Include downstream water users (e.g. water supply, irrigation, livestock watering) in planning of water storage reservoirs. • Identify proper mechanism of rights and responsibilities over well/pump/reservoir usage through participatory village focus groups. • Ensure that local accessible materials are used when developing/rehabilitating wells in order to provide maintenance. • For each pump/well/reservoir/ borehole establish clear guidelines of user rights through participatory focus groups; Ensure that access to water pumps/reservoirs is equitable to prevent capture by interest groups. • Use archaeological chance find procedures and coordinate with appropriate agencies.
Sanitation and Wastewater • Latrines, cesspits.	
Contamination of water supplies: • contamination of groundwater because of seepage. • contamination of surface waters due to flooding or over-flowing.	• Where pit latrines are used they should be located more than 10m from any water source. The base should be sealed and separated vertically by not less than 2m of sand or loamy soil from the groundwater table. • Where nightsoil latrines or septic tanks are built they should be sealed. Outflows should drain either to a soak away located at least 10m from any water source or be connected to a working drain. • Maintenance training to be delivered along with new latrines.
Disease caused by poor handling practices of nightsoil.	• Training and health education to be provided to nightsoil handlers where affected by interventions. • Protective clothing and appropriate containers for nightsoil transportation to be provided.

Potential Impacts	Prevention and Mitigation Measures
Disease caused by inadequate excreta disposal or inappropriate use of latrines.	• Nightsoil should be handled using protective clothing to prevent any contamination of workers skin or clothes. • Where nightsoil is collected for agricultural use it should be stored for a sufficient period to destroy pathogens through composting. At the minimum it should be stored in direct sunlight and turned regularly for a period of at least 6 weeks. • Septic tanks should not be constructed nor septic waste collected unless primary and secondary treatment and safe disposal is available. • Health and hygiene education to be provided for all users of latrines. • Awareness campaign to maintain sanitary conditions.
Potential health and environmental risks associated with use of treated wastewater effluent for irrigation: • Socio-Economic Risk • Permanent loss of productive land • Reduction in local property values • Ability to pay of poorer segments of population.	• Secondary treatment of wastewater and chlorination of final effluent followed by aeration prior to restricted wastewater reuse; initial monitoring of irrigation water quality in irrigation channels in addition to effluent monitoring at treatment plant outfall. • Purchase of replacement land. • Monetary compensation. • Reconsideration of rate structures.
Solid Waste • New or rehabilitation of transfer stations. • Solid waste collection.	
Disease caused by inadequate collection and disposal, including health risks from: • insects, rats. • burning of waste. • industrial/medical waste. • Odors during operation.	• Sufficient frequency of collection from transfer stations. • Containment of waste during collection and transfer. • Promote separation at source to reduce spreading by rag-pickers during recycling. • Minimize burning. • Separate collection and disposal system for medical or hazardous wastes. • Assess requirement for additional investment in final disposal site. • Provide daily soil covering.

Potential Impacts	Prevention and Mitigation Measures
Contamination of water supplies: • lateral seepage into surface waters. • seepage of contaminants into aquifers. • contamination from clandestine dumping.	• Site transfer stations should have sealed base and be located at least 15m away from water sources with the base separated vertically by not less than 2m of sand or loamy soil from the groundwater table. • Assess requirement for additional investment in final disposal site to protect water sources. • Monitoring of site to prevent illegal dumping.
Housing and Public Buildings	
• **Rehabilitation of dwellings or public buildings.**	
Injury and death from earthquake.	• Apply low-cost seismic structural designs.
Disease caused by inadequate provision of water and sanitation.	• Ensure designs include adequate sanitary latrines and access to safe water.
Damage to historical buildings.	• Ensure actions involving historical buildings are reviewed/designed by qualified specialists.
Rehabilitation of Clinics and Building Dispensaries.	
Environmental Impacts: • Improper disposal of wastes. • Improper disposal of medical wastes. • Sanitation problems. • Some construction related problems but usually minor in nature. • Medical waste disposal. • Storage of hazardous materials. • Spread of disease from incoming laborers.	• Ensure inclusion of adequate sanitation facilities and maintenance. • Ensure planning, design and maintenance of infrastructure is appropriate to local needs, traditions, culture and desires. • Proper disposal of all solid wastes, containers, infectious wastes. • Public health awareness. • Priority given to rehabilitation of toilets in rehabilitation of /clinics. • Undertake awareness activities to reduce risk of transmission of diseases.

Potential Impacts	Prevention and Mitigation Measures
Social Impacts: • The vulnerable groups (women, poor children, migrants, pastoralists and the poor) may not benefit from infrastructure construction and rehabilitation. • health posts may become abandoned due to the lack of commitment. • Building infrastructure system alone without needs assessment may not benefit the community. • Infrastructure investments may be misappropriated by governments.	• Before the start of each infrastructure project, develop comprehensive organizational and maintenance plan, commitment from local government and public to maintain school supplies, medical supplies, etc.

ANNEX 7B: SAFEGUARDS PROCEDURES FOR INCLUSION IN THE TECHNICAL SPECIFICATIONS OF CONTRACTS

I. General

1. The Contractor and his employees shall adhere to the mitigation measures set down and take all other measures required by the Engineer to prevent harm, and to minimize the impact of his operations on the environment.

2. The Contractor shall not be permitted to unnecessarily strip clear the right of way. The Contractor shall only clear the minimum width for construction and diversion roads should not be constructed alongside the existing road.

3. Remedial actions which cannot be effectively carried out during construction should be carried out on completion of each Section of the road (earthworks, pavement and drainage) and before issuance of the Taking Over Certificate:

(a) these sections should be landscaped and any necessary remedial works should be undertaken without delay, including grassing and reforestation;

(b) water courses should be cleared of debris and drains and culverts checked for clear flow paths; and

(c) borrow pits should be dressed as fish ponds, or drained and made safe, as agreed with the land owner.

4. The Contractor shall limit construction works to between 6 am and 7 pm if it is to be carried out in or near residential areas.

5. The Contractor shall avoid the use of heavy or noisy equipment in specified areas at night, or in sensitive areas such as near a hospital.

6. To prevent dust pollution during dry periods, the Contractor shall carry out regular watering of earth and gravel haul roads and shall cover material haulage trucks with tarpaulins to prevent spillage.

II. Transport

7. The Contractor shall use selected routes to the project site, as agreed with the Engineer, and appropriately sized vehicles suitable to the class of road, and shall restrict loads to prevent damage to roads and bridges used for transportation purposes. The Contractor shall be held responsible for any damage caused to the roads and bridges due to the transportation of excessive loads, and shall be required to repair such damage to the approval of the Engineer.

8. The Contractor shall not use any vehicles, either on or off road with grossly excessive, exhaust or noise emissions. In any built up areas, noise mufflers shall be installed and maintained in good condition on all motorized equipment under the control of the Contractor.

9. Adequate traffic control measures shall be maintained by the Contractor throughout the duration of the Contract and such measures shall be subject to prior approval of the Engineer.

III. Workforce

10. The Contractor should whenever possible locally recruit the majority of the workforce and shall provide appropriate training as necessary.

11. The Contractor shall install and maintain a temporary septic tank system for any residential labor camp and without causing pollution of nearby watercourses.

12. The Contractor shall establish a method and system for storing and disposing of all solid wastes generated by the labor camp and/or base camp.

13. The Contractor shall not allow the use of fuelwood for cooking or heating in any labor camp or base camp and provide alternate facilities using other fuels.

14. The Contractor shall ensure that site offices, depots, asphalt plants and workshops are located in appropriate areas as approved by the Engineer and not within 500 meters of existing residential settlements and not within 1,000 meters for asphalt plants.

15. The Contractor shall ensure that site offices, depots and particularly storage areas for diesel fuel and bitumen and asphalt plants are not located within 500 meters of watercourses, and are operated so that no pollutants enter watercourses, either overland or through groundwater seepage, especially during periods of rain. This will require lubricants to be recycled and a ditch to be constructed around the area with an approved settling pond/oil trap at the outlet.

16. The contractor shall not use fuelwood as a means of heating during the processing or preparation of any materials forming part of the Works.

IV. Quarries and Borrow Pits

17. Operation of a new borrow area, on land, in a river, or in an existing area, shall be subject to prior approval of the Engineer, and the operation shall cease if so instructed by the Engineer. Borrow pits shall be prohibited where they might interfere with the natural or designed drainage patterns. River locations shall be prohibited if they might undermine or damage the river banks, or carry too much fine material downstream.

18. The Contractor shall ensure that all borrow pits used are left in a trim and tidy condition with stable side slopes, and are drained ensuring that no stagnant water bodies are created which could breed mosquitoes.

19. Rock or gravel taken from a river shall be far enough removed to limit the depth of material removed to one-tenth of the width of the river at any one location, and not to disrupt the river flow, or damage or undermine the river banks.

20. The location of crushing plants shall be subject to the approval of the Engineer, and not be close to environmentally sensitive areas or to existing residential settlements, and shall be operated with approved fitted dust control devices.

V. Earthworks

21. Earthworks shall be properly controlled, especially during the rainy season.

22. The Contractor shall maintain stable cut and fill slopes at all times and cause the least possible disturbance to areas outside the prescribed limits of the work.

23. The Contractor shall complete cut and fill operations to final cross-sections at any one location as soon as possible and preferably in one continuous operation to avoid partially completed earthworks, especially during the rainy season.

24. In order to protect any cut or fill slopes from erosion, in accordance with the drawings, cut off drains and toe-drains shall be provided at the top and bottom of slopes and be planted with grass or other plant cover. Cut off drains should be provided above high cuts to minimize water runoff and slope erosion.

25. Any excavated cut or unsuitable material shall be disposed of in designated tipping areas as agreed to by the Engineer.

26. Tips should not be located where they can cause future slides, interfere with agricultural land or any other properties, or cause soil from the dump to be washed into any watercourse. Drains may need to be dug within and around the tips, as directed by the Engineer.

VI. Historical and Archeological Sites

27. If the Contractor discovers archeological sites, historical sites, remains and objects, including graveyards and/or individual graves during excavation or construction, the Contractor shall:

(a) Stop the construction activities in the area of the chance find.

(b) Delineate the discovered site or area.

(c) Secure the site to prevent any damage or loss of removable objects. In cases of removable antiquities or sensitive remains, a night guard shall be present until the responsible local authorities and the Ministry of Culture take over.

(d) Notify the supervisory Engineer who in turn will notify the responsible local authorities and the Ministry of Culture immediately (less than 24 hours).

(e) Contact the responsible local authorities and the Ministry of Culture who would be in charge of protecting and preserving the site before deciding on the proper procedures to be carried out. This would require a preliminary evaluation of the findings to be performed by the archeologists of the Ministry of Culture (within 72 hours). The significance and importance of the findings should be assessed according to the

various criteria relevant to cultural heritage, including the aesthetic, historic, scientific or research, social and economic values.

(f) Ensure that decisions on how to handle the finding be taken by the responsible authorities and the Ministry of Culture. This could include changes in the layout (such as when the finding is an irremovable remain of cultural or archeological importance) conservation, preservation, restoration and salvage.

(g) Implementation for the authority decision concerning the management of the finding shall be communicated in writing by the Ministry of Culture; and

(h) Construction work will resume only after authorization is given by the responsible local authorities and the Ministry of Culture concerning the safeguard of the heritage.

VII. Disposal of Construction and Vehicle Waste

28. Debris generated due to the dismantling of the existing structures shall be suitably reused, to the extent feasible, in the proposed construction (e.g., as fill materials for embankments). The disposal of remaining debris shall be carried out only at sites identified and approved by the project engineer. The contractor should ensure that these sites (a) are not located within designated forest areas; (b) do not impact natural drainage courses; and (c) do not impact endangered/rare flora. Under no circumstances shall the contractor dispose of any material in environmentally sensitive areas.

29. In the event any debris or silt from the sites is deposited on adjacent land, the Contractor shall immediately remove such, debris or silt and restore the affected area to its original state to the satisfaction of the Supervisor/Engineer.

30. Bentonite slurry or similar debris generated from pile driving or other construction activities shall be disposed of to avoid overflow into the surface water bodies or form mud puddles in the area.

31. All arrangements for transportation during construction including provision, maintenance, dismantling and clearing debris, where necessary, will be considered incidental to the work and should be planned and implemented by the contractor as approved and directed by the Engineer.

32. Vehicle/machinery and equipment operations, maintenance and refueling shall be carried out to avoid spillage of fuels and lubricants and ground contamination. An "oil interceptor" will be provided for wash down and refueling areas. Fuel storage shall be located in proper bunded areas.

33. All spills and collected petroleum products shall be disposed of in accordance with standard environmental procedures/guidelines. Fuel storage and refilling areas shall be located at least 300m from all cross drainage structures and important water bodies or as directed by the Engineer.

ANNEX 8A: ANALYSIS OF HOSPITALS SELECTED FOR REHABILITATION

Name of Hospital	Location	Total Number of Hospital Beds	Existing Number of Emergency Beds	Proposed Number of Emergency Beds	Area of Existing Emergency Unit (m2)	Area Requiring Rehabilitation (m2)	Area of New Extension (m2)	Population Coverage
A	B	C	D	E	F	G	H	I
1 Al Yarmouk T.H.	Baghdad/Karkh Yarmouk City	660	28	28	2,000	2,000	-	2,925,010
2 Al Karkh G. H.	Baghdad/Karkh	200	8	24	550	550	550	
3 Al Kindy T. H.	Baghdad/SD	223	24	24	1,000	1,000	300	3,142,225
4 Al Imam Ali G. H.	Baghdad/SD	342	31	31	850	850	100	
5 Baquba G.H	Diyala/Baquba	296	19	29	600	600	400	1,407,180
6 Kirkuk T. H	Kirkuk	425	24	30	700	700	200	902,011
7 Amara G. H.	Missan	482	24	30	700	700	200	778,685
8 Al Hussein G.H.	Karbala	343	28	31	700	700	200	803,674
9 Al Ramadi T. H.	Anbar/Ramadi City	428	24	30	700	700	200	2,162,997
10 Samarra G. H.	Salah Deen/Samara City	147	10	20	-	-	700	172,251
11 Rizgari T. H.	Erbil	400	24	30	700	700	200	1,300,000
12 Jumhouri G.H	Sulaimanyiah	197	10	20	-	-	700	1,620,000
Totals		**4,143**	**254**	**327**	**8,500**	**8,500**	**3,750**	**15,214,033**

Notes:

a/ Area per bed = 35 m2

b/ Basecost of Rehab US$660 per m2 rehabilitation

c/ Basecost of Extension US$1,030 per m2 new

Selection of Priority Emergency Unit Buildings for Rehabilitation

The process for selection of the priority Emergency Unit Buildings for rehabilitation under the project mainly has followed the guidelines earlier presented in the "Criteria for Selecting Priority Hospital Facilities for Rehabilitation" (see below). The MOH established a list of priority Emergency Units with balanced geographical spread over the country. The selected twelve Emergency Units are located in nine different governorates of Iraq. Four units are located in Baghdad with a good spread to different areas of the city. The remaining eight units are distributed to the following regions/cities: Dyala/Baquba, Kirkuk, Missan/Amará City, Karbala, Anbar/Ramadi City, Salah Deen/Samará City, Erbil, and Sulaimanyiah.

Some important governorates have been excluded from the list of priority Emergency Units mainly because of the activities of other donors, for example, the Nasiriyah area (Italian funding) and the Basra area (British funding). The rehabilitation of 15 hospitals, constructed in 1986 by the Japanese Contractor Marubeni, may receive Japanese funding, according to preliminary information.

The twelve Emergency Units are related to hospitals with an average capacity of 360 beds. Five of the hospitals are teaching hospitals and seven are general hospitals. The largest hospital included in the list of priority Emergency Units is the 660 bed Al-Yarmook Teaching Hospital in Baghdad City. The most extensive rehabilitation works also are proposed in this hospital, i.e., full rehabilitation of 2000 m^2 at an estimated construction cost of US$1.4 million. The average area of all twelve Emergency Units proposed for rehabilitation is 700 m^2 and the average construction cost US$540,000.

In all hospitals, except for the Al-Yarmook Teaching Hospital, new extensions are proposed to the existing Emergency Unit Buildings. The average area of the extensions is 310 m^2 and the average construction cost US$300.000. The total average area of the rehabilitation and extension works for all twelve Emergency Units is 1020 m^2 and the average total construction cost is US$840,000.

The selection of the priority Emergency Units seems to be thoroughly well-founded and motivated, although this could not be confirmed by the mission as the background material for the selection and evaluation process has not yet been compiled into an evaluation report. The PMT was requested to present an evaluation report in condensed form based on the selection criteria mentioned above. The evaluation report would be an excellent tool for increasing the understanding of the rehabilitation project among Iraqi officials and Bank staff not directly involved in the project appraisal process.

Criteria for Selecting Priority Hospital Facilities for Rehabilitation

Priority hospital services, such as emergency units, emergency obstetric services, critical care services (operation departments, ICU, CCU, acute radiology, etc.) and support services (central sterilization departments, laboratories, etc.) will be partly or fully rehabilitated and equipped in 12 carefully selected hospitals.

The following essential data were required for the selection of priority hospital services and for finalization of the list of priority projects:

- The present and future role of the facility in the medical structure of Iraq, with regard to medical services, medical training and location;
- Size of the population served (the community's dependence on the facility based on patient origin information and percentage of users from the community that go to the specific facility);
- Other similar medical services offered within the same catchment area (duplication with other donors/other medical providers within the catchment area);
- Accessibility for patients, ambulances and other emergency vehicles (strategic location in the region/catchments area, location in the traffic/road network, intensity of traffic on access roads, risks for traffic congestions, quality of public transports, etc.);
- Present and planned medical production/utilization (number of outpatient visits to each clinical service including emergency cases and utilization of the health institution's ancillary and adjunct services; number of radiology examinations, laboratory analyses, deliveries and operations in different specialties; number of beds, planned and acute admissions, average length of stay and occupancy rate in each clinical service including recovery and post-operative beds, ICU, CCU, etc.);
- Number of staff per category;
- Year of construction and current functional and technical condition of buildings (including technical supply systems for water, sewage, electricity, telecommunication, heating, air-condition, medical gases, etc.) and of major medical equipment and hospital information systems;
- Total site area of the hospital in hectares (size of available land);
- Total gross floor area (total area of all floor levels between outer faces of containing walls) of the facility as a whole and of each separate building;
- Net floor area of each principal unit of the hospital which is proposed for rehabilitation or upgrading (floor area calculated to the interior of containing walls including partitions and corridors within a department, etc.);
- Current plans for rehabilitating and/or upgrading facilities and medical equipment (including city maps, site plans, floor plans, and photos showing the present situation);
- Preliminary cost estimates of the proposed works and of other planned measures (purchasing of medical equipment, etc).

Example of qualifying criteria for a given facility:

- It is evident that the facility will play an important role in the future medical structure of Iraq;
- The facility is of crucial importance within a heavily populated catchment area;
- The facility is the sole important source of medical emergency services within the catchment area;
- The accessibility to the facility via public transport and the traffic/road network is greater than for other equivalent facilities within the same catchment area;
- The health institution offers (or can easily be upgraded to offer) a complete range of medical emergency services, i.e., a functioning accident and emergency unit with close and quick access to diagnostic facilities (emergency radiology and laboratory services, etc.) and

treatment/critical care facilities (operation theatres, ICU, CCU, etc.) as well as close access to observation beds, emergency assessment beds, and post acute beds;

- The staffing is well-balanced (or can easily be upgraded to well-balanced) against the planned future medical capacity of the health institution;
- The current functional and technical condition of the building meets minimum standards for justifying major investments and will extend the life of the facility by an additional 15-20 years;
- The land available for the facility will permit future extensions of the medical services over a period of 15-20 years;
- The capacity and the total gross floor area of the health institution is sufficient for the planned rehabilitation and/or upgrading of the medical services without costly new buildings;
- The current plans for rehabilitation and upgrading of the facilities and medical equipment can be realized within the budget available for the facility.

ANNEX 8B. LIST OF MEDICAL AND LABORATORY EQUIPMENT

Sl #	Product Description	Quantity
1	Emergency Resuscitation Trolley c/w Defibrillator, Monitor, Suction, IV, O2, laryngoscope, resuscitation bag and masks,forceps and tubing	12
2	Minor Operating Table c/w anti static mattress, shoulder rests and lithotomy poles,adjustable height	24
3	ECG machine 3/6/12 lead portable, mains/rechargeable c/w spares & accessories	24
4	Mobile Double Bottle Suction Unit, 2 Litre c/w Spare Bottles, Filters, Tubing & Accessories	36
5	Defibrillator c/w Monitor and recorder mains /battery operated 1 - 360 joules (external) and 1 - 50 (internal). ECG monitor with heart rate indicator and alarms	24
6	Hot Air Sterilizer suitable for sterlizing small instruments e.g. forceps, scissors etc.	12
7	Oxygen Cylinder Trolley Mounted mobile large size cylinder (NB Need to check fitting)	113
8	Oxygen Regulator c/w small bottle humidifier	226
9	Complete Emergency Resuscitation Kit c/w ambu bag, adult & child sphygmomanometer, laryngoscope, stethoscope, manual suction, adult, child and infant masks, airways, endotracheal tubes (various),nasogastric tubes, scissors & forceps	24
10	Mobile X Ray unit, 125kva all purpose (plus start up items e.g. screen, aprons, hangers)	12
11	Pulse Oximeter Portable, rechargeable c/w finger sensor	113
12	Cardiac Monitor portable single channel, mains operated	85
13	Portable Ventilator for emergency use, c/w circuit hose, exhalation valve	12
14	Infusion Pump Mobile Volumetric adult/paediatric and rechargeable battery operation	42
15	Nebulizer Portable for adult & child use,c/w masks, mouth pieces, tubing	113
16	Biochemistry Autoanlyzer, electrolyte urea creatinine, sodium, potassium etc.	12
17	Ultrasound mobile for emergency use to cover abdominal, cardiac, obstetric and gynae use	24
18	Hospital Bed, Kings Fund type type hydraulic variable height, Trendelenburg and Reverse Trendelenburg, removable foot and head ends, adjustable back rest c/w 1V pole attachment.	339
19	Mobile Operating light, four light source with integral emergency battery power unit, Light intensity 75000 lux. On mobile stand with anti static castors	24
20	Foot or hand operated suction pump for emergency use. Double bottle model. Maximum vacuum 450 mm Hg, total capacity 600 ml, positive/negative pressure valve for adult and child use c/w tubing	24
	Total	**1,295**

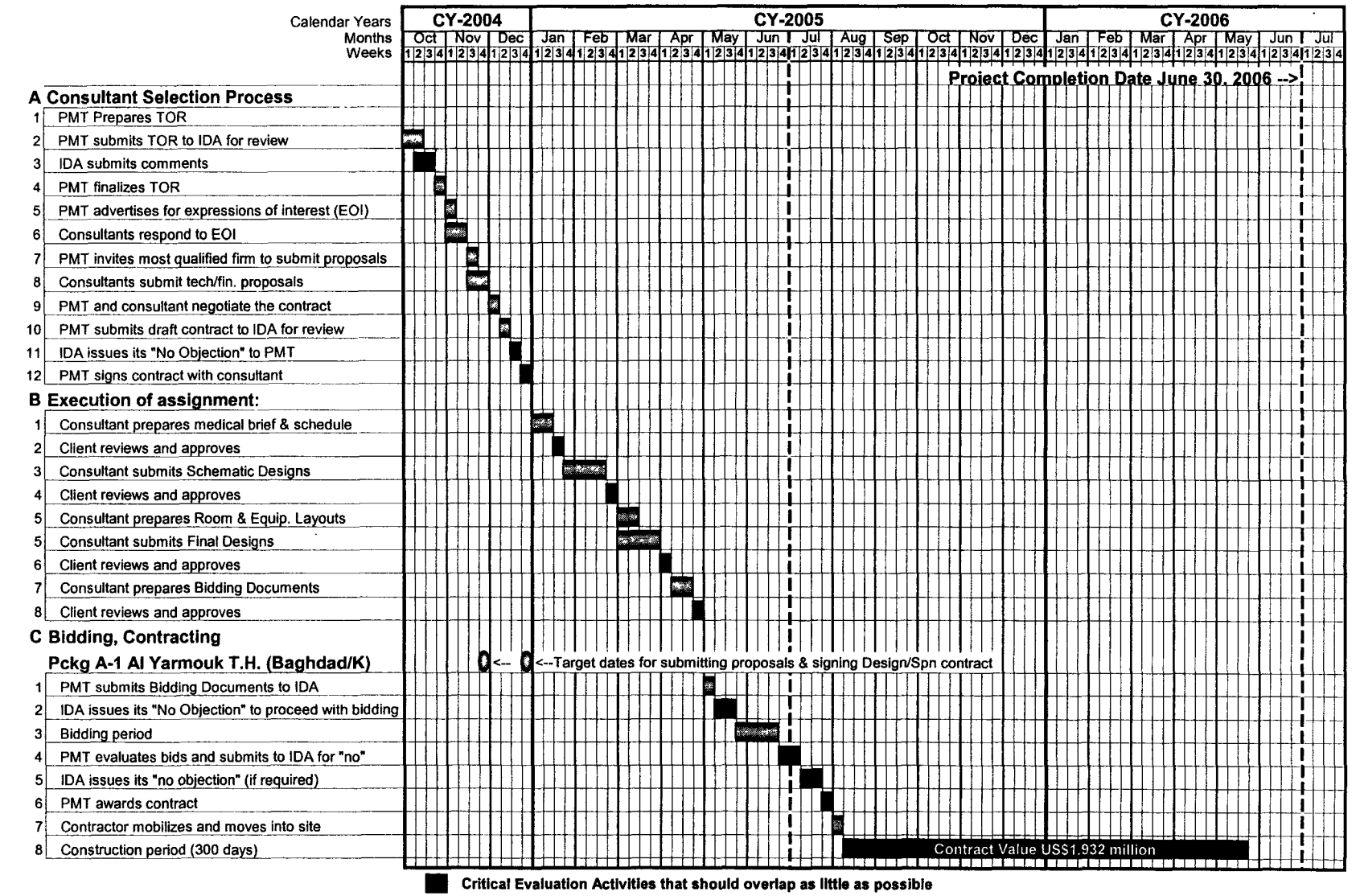
Note: Breakdown of quantities by Hospital is indicated in the PIM

ANNEX 8C. LIST OF EMERGENCY MEDICAL DRUGS

Sl #	Product Description	Quantity
	Package-1, Direct Contracting, under 3.6 (c) of the Guidelines	
1	Alteplase Injection	427
	Package-2, ICB	
1	Adrenaline Injection	64,000
2	Aminophylline Injection	42,650
3	Atenolol Injection	42,650
4	Atropine Injection	42,650
5	Calcium Gluconate Injection	21,300
6	Chrophenamine Injection	32,000
7	Dexamethasone Injection	95,950
8	Dextron 70	74,650
9	Diazepam Injection	42,650
10	Diclofenac Sodium Injection	64,000
11	Digoxin Injection	21,300
12	Dopamine Hydrochloride Injection	32,000
13	Ergometrine Injection	10,670
14	Furosemide Injection	95,950
15	Glyceryl Trinitrate Injection	21,300
16	Heparin Sodium Injection	21,300
17	Hydrocortisone Injection	32,000
18	Hypertonic Glucose 50% Injection	21,300
19	Isosolbide dinitrate Injection	42,650
20	Ketamine Hydrochroride Injection	5,380
21	Lidocaine Hydrochoride 2% Injection	25,580
22	Lidocaine Hydrochoride 2% Injection with adrenaline	25,580
23	Metochlopromide Hydrochroride Injection	95,950
24	Metronidazole IV Infusion	7,670
25	Nifidipine Capsules	127,900
26	Pathidine Hydrochroride Injection	25,600
27	Phenobarbital Injection	21,300
28	Potassium Chloride Concentrate Sterile Injection	21,300
29	Propranolol Injection	21,300
30	Ranitidine Hydrochroride Injection	32,000
31	Sulbutamol sulfate Injection	95,950
32	Sodium Bicarbonate Injection	21,300
33	Suxamethonium Chroride Injection	5,380
34	Thiopental Sodium powder Injection	5,380
35	Virapamil Hydrochloride Injection	32,000
36	Vitamine K (Phytomenadion) Injection	21,300
	Total	**1,412,267**

Note: Breakdown of quantities by Hospital is indicated in the PIM

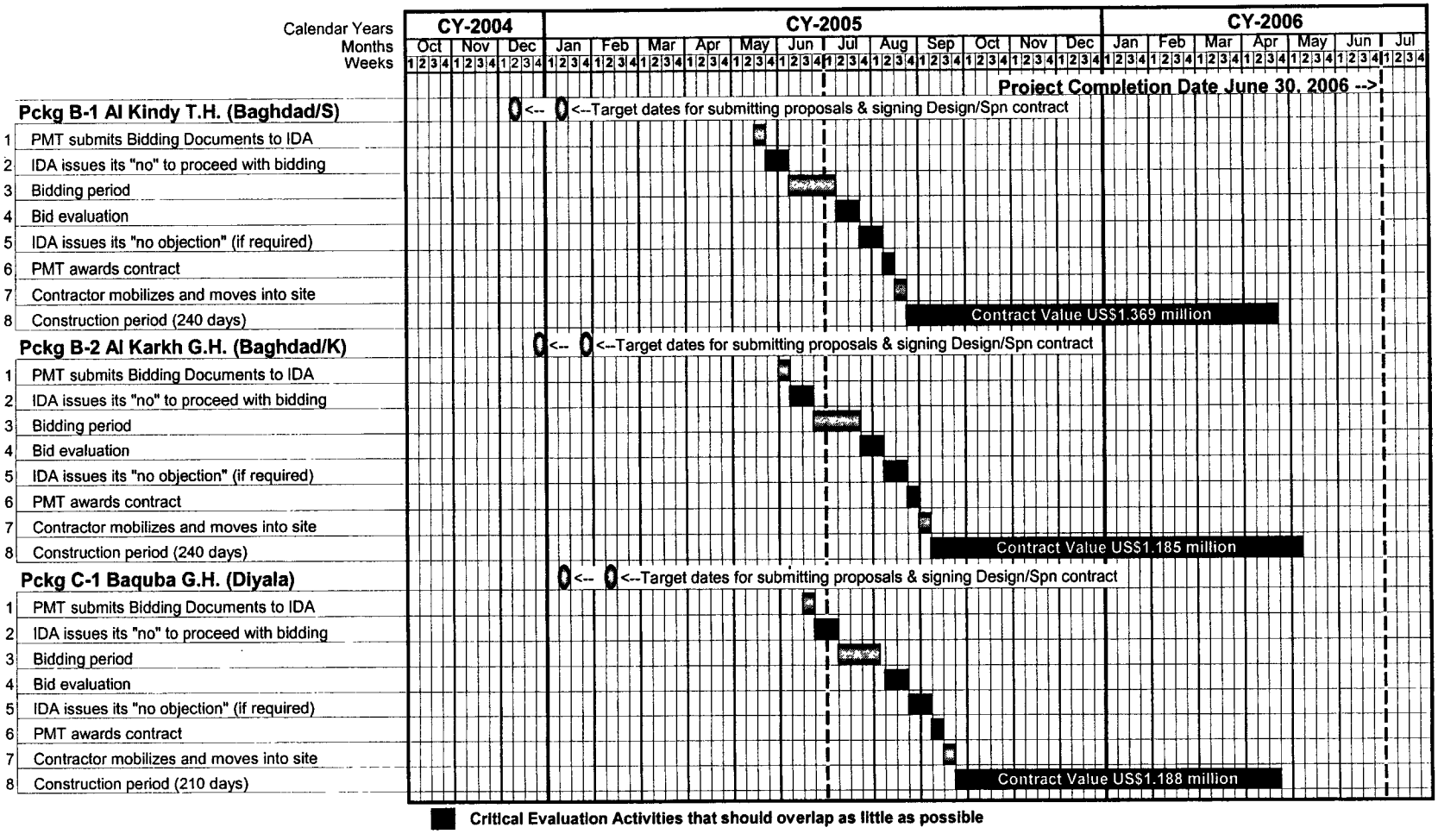
ANNEX 9. PROJECT IMPLEMENTATION SCHEDULE



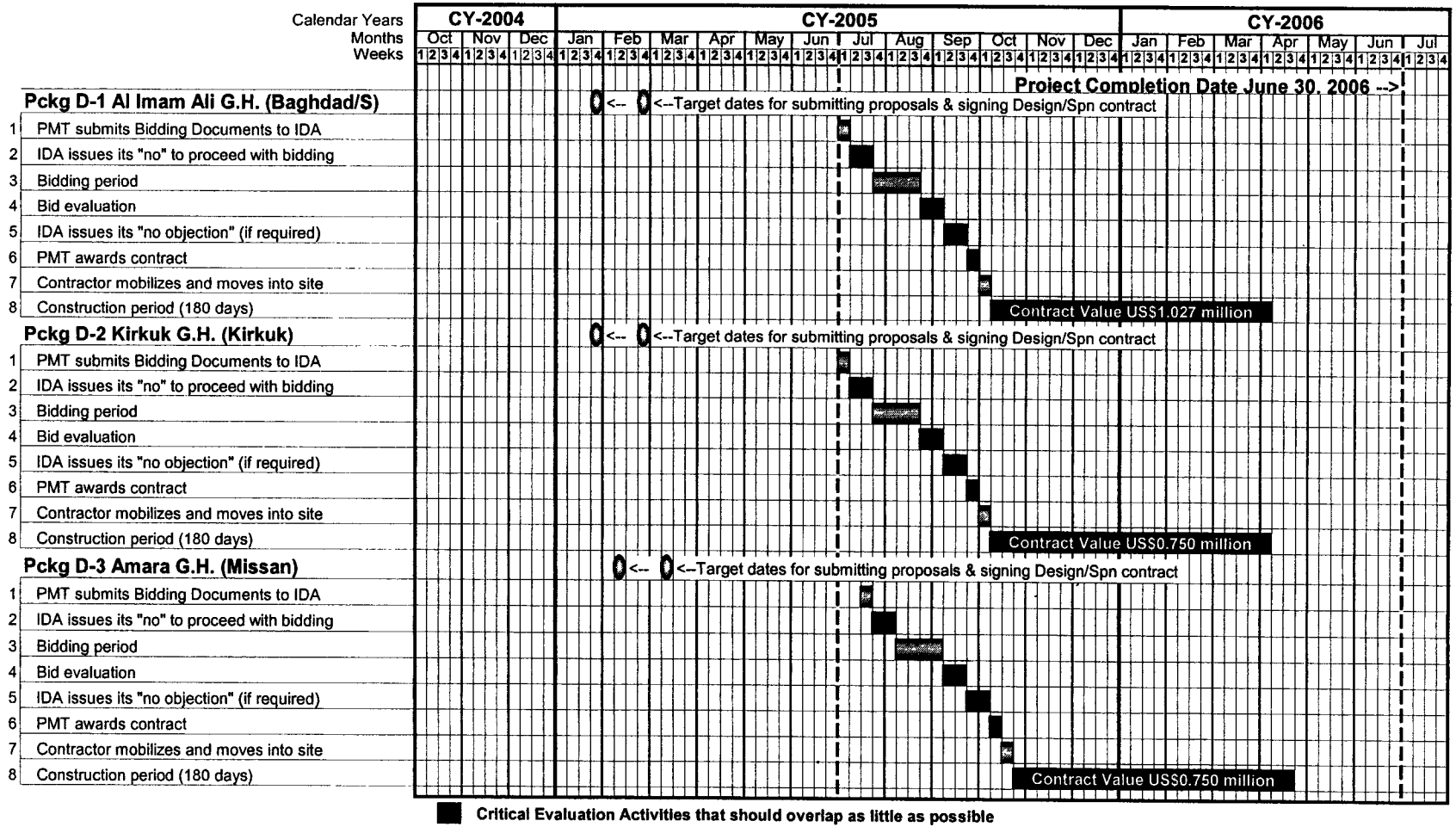
Note:

Consultant Selection Process would start for all Assignments at the start of the Project.
Submission of Proposals and Contracting would be as indicated on the Schedule
Execution of Assignment Activities (B 1-8) would be repeated for each Package as indicated

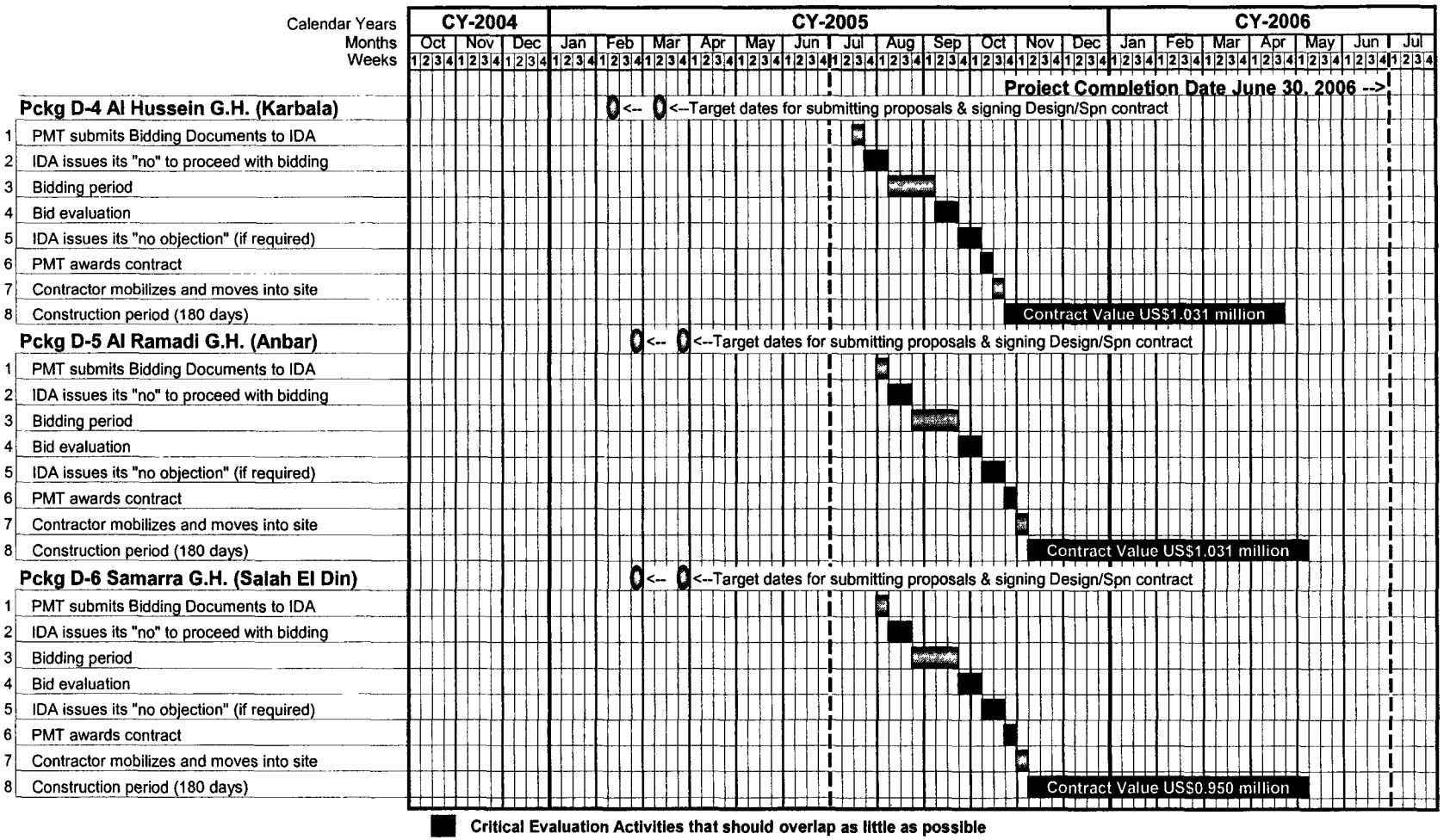
Project Implementation Schedule (cont'd)



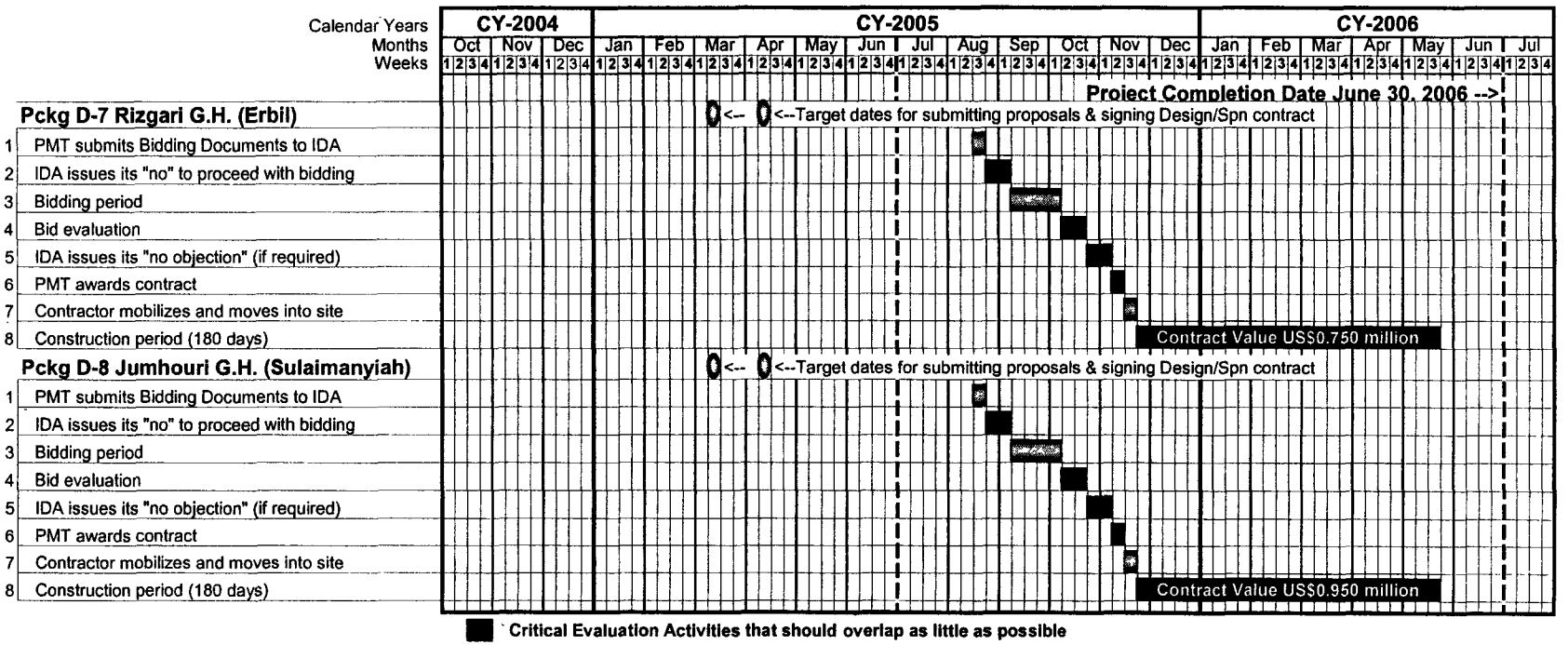
Project Implementation Schedule (cont'd)



Project Implementation Schedule (cont'd)



Project Implementation Schedule (cont'd)



ANNEX 10: INTERNATIONAL DONOR HEALTH ACTIVITIES IN THE REPUBLIC OF IRAQ

Donor Agency	Description of Health-related Activities	US$	Funding Source
World Bank	The Iraq Emergency Rehabilitation Project activities include: • Emergency rehabilitation of 12 emergency health facilities; • Urgent provision of basic medical and laboratory equipment and essential emergency drugs to the 12 rehabilitated sites; and • Strengthening of planning and management capacity within the central and provincial health administrations. Additional technical assistance in health policy and health systems development has been provided through EU, IRFFI and World Bank funding.	25,000,000	IRRFI
UN Health Cluster **(WHO, UNICEF, UNFPA)**	UN Health Cluster approved projects: • Emergency Obstetric Care - UNFPA • Supporting Primary Health Care System - WHO • Re-establishing the National Drug Quality Control Laboratory - WHO • Strengthening non-communicable diseases and mental health controls – WHO ***Pipeline:*** Specific activities not available but budget in pipeline: US$ 78,000,000	12,603,000 37,363,000 5,977,000 11,000,000	IRRFI (other donors such as USAID, JICA and EU have funded various activities under their project objectives)
US/PCO **(United States Iraq Project and Contracting Office)**	Construction: The Buildings, Health and Education Sector (BHE) will spend $786 million on healthcare facilities and healthcare-related equipment. To date, roughly $70 million of the total $916 million allocated to general renovation and construction projects have been spent. More specifically, the BHE Sector has begun renovations on five hospitals. The BHE to-do list includes rehabilitating and constructing approximately 150 primary healthcare centers and renovating 19 hospitals. **Non-construction:**	786,000,000	US

	• Equipment Procurement/Modernization – Equipment for clinics/hospitals, staff training • Capacity Building – Infectious disease control, National health policy reform, institutional decentralization		
USAID (United States Agency for International Development)	**Abt Associates:** Contract supporting a reformed Iraqi Ministry of Health (MOH) at the national, regional and local levels; delivering health services; providing medical equipment and supplies; training and recruiting health staff; providing health education and information; and determining the specific needs of the health sector and vulnerable populations such as women and children. **Grant to UNICEF:** Grant provides for: restoration/provision of basic health services to the most vulnerable populations, focusing on women and children; support for primary health care services; fund essential medicines, vaccines and micronutrients; establishment a rapid referral and response system for the most serious cases; and publishing and distribution relevant health education materials and nutritional assessments. **Grant to WHO:** Grant provides for: identification of crucial immediate and short-term health care needs of the population; rapid restoration of essential health services for the population; and strengthening of the capacity of a reformed Iraqi Ministry of Health to manage the health sector including review and further development of health policies and health system management.	23,000,000 8,000,000 1st year (up to 40,000,000) 10,000,000	US
JICA (Japan International Cooperation Agency)	**Humanitarian Assistance for Iraq** (a) World Food Programme (WFP): food supply (b) United Nations Children's Fund (UNICEF): child care, education (c) International Committee of the Red Cross (ICRC): distribution of medical supplies (d) United Nations High Commissioner for Refugees (UNHCR): assistance for refugees **Assistance for the emergency medical activities of NGOs** (a) Japan Platform Joint Team operating in Jordan (b) Peace Winds Japan operating in Northern Iraq **Humanitarian and Recovery Assistance**	29,500,000 (combined with other sectors)) 3,300,000 90,000	JICA

	Grassroots Assistance to Umm Qasr Community: provision of vehicles, pharmaceutical kits and potable water tanks **Assistance to the following NGO activities** (a) Medical projects and distribution of emergency supplies in Iraq carried out by Japan Platform (Japanese NGOs) (b) Project distributing medical supplies including antibiotics in Iraq run by Hashemite Charity Organization (Jordanian NGO, May 16) (c) Project distributing medical equipment such as Infant Intravenous Kits run by CARE International (International NGO, May 16) **Further consideration will be given to implementing the following projects:** (a) Emergency Assistance for Hospital Rehabilitation and Equipment Activities: rehabilitate general hospitals for which Government of Japan had provided loan aid in the past. (b) Emergency Water and Sanitation Rehabilitation Programme Activities: provide support for projects in the areas of water supply, drainage and sanitation. (c) Reconstruction of Public and Other Facilities in Iraq Activities: rehabilitate public facilities as "reconstruction models."	2,700,000 24,450,000 (combined with other sectors)	
EU/ECHO **(European Union/European Community Humanitarian Aid Department)**	(a) Emergency relief operations of the following partners were funded: • The International Committee of the Red Cross: for food, medical kits and rehabilitation of water/sanitation facilities in conflict-affected areas. • UNICEF: for water tankering, sanitation, emergency rehabilitation of primary healthcare centres and hospitals in the centre and south of Iraq. • CARE: for emergency water supply in the Baghdad region as well as Al Anbar governorate (west) where 30,000 people had no access to water. • Première Urgence: for basic repairs to health institutions, tents to boost hospital capacity, back-up generators and water supplies in the Baghdad area, in support of up to 20,000 civilian victims of the fighting. • UN Office for the Coordination of Humanitarian Affairs (OCHA): for coordination activities in countries of the region neighboring Iraq. (b) This funding was meant to meet urgent medical needs in Iraq, following bomb damage and widespread looting that affected hospitals and other health facilities. The funding covered the	12,377,000 (combined with other sectors) 13,029,000 (combined	EU

	provision of medical and hygiene supplies to medical facilities (the first consignment was airlifted to Baghdad on May 9), rehabilitation of damaged or looted infrastructures, including the restoration of water and electricity supplies, support for emergency medical and surgical care, and emergency vaccination campaigns. Partners for this decision were Médecins du Monde (Spain and Greece), Terre des Hommes (IT), GOAL, Gruppo di Volontariato Civile (GVC), Aide Médicale Internationale (France), Première Urgence (France), CARE (NL), Télécommunications sans Frontières and UNICEF. (c) This funding was meant to complement the "Oil-for-Food" programme, which was then managed by the United Nations humanitarian agencies. Projects funded included: • Health and nutrition: rehabilitation of health and social infrastructures, training in disease surveillance, distribution of essential medicines, materials and equipment, provision of fresh food for hospital patients, and complementary food supplies. • Other sectors: water and sanitation; coordination, logistics and technical assistance, including the opening in Baghdad of an ECHO support office shortly after the war ended. The partners were Acted, Action contre la faim, Alisei, Aide Médicale Internationale, Care-UK, Comité d'aide médicale, COOPI, COSV, Dan Church Aid, Enfants du monde-Droits de l'homme, Gruppo di Volontariato Civile, Help Age, the International Organization for Migrations, INTERSOS, Merlin, Movimondo, Oxfam, Pharmaciens sans Frontières, Première Urgence, Solidarités, Télécommunications sans Frontières, Terre des Hommes, Un Ponte per..., the United Nations Development Programme, UNICEF, the World Food Programme, and the World Health Organisation. (d) The objective of this funding, to be implemented in 2004, is to respond effectively to the continuing humanitarian needs in Iraq. Activities include: • Health: rehabilitation of primary health centres, provision of medical equipment and drugs, support for mother and child health actions, promotion of safe blood transfusion programmes and support for disease surveillance and the development of accurate health information systems. • Other sectors: water and sanitation; education; de-mining; emergency relief for IDPs; and security strengthening.	with other sectors) 48,208,000 (combined with other sectors) 41,364,000 (combined with other sectors)	

NGOs	NGOs are subcontracted by the above donors whose activities are delineated above. To avoid duplication of activities, they are not included in this table.	NA	Various

Sources:

UN Health Cluster:
http://www.irffi.org/WBSITE/EXTERNAL/IRFFI/0,,contentMDK:20241686~menuPK:497875~pagePK:64168627~piPK:64167475~theSitePK:49145
8,00.html
US/PCO: http://www.rebuilding-
iraq.net/portal/page?_pageid=75,80102&_dad=portal&_schema=PORTAL&p_tab_id=1571&p_link_id=1573&Regid=1
USAID: http://www.usaid.gov/iraq/activities.html
EU/ECHO: http://europa.eu.int/comm/echo/field/iraq/funding2003_en.htm
JICA: http://www.embjapan.org/english/html/policies/political/assistanceforiraqsummary.htm
World Bank: http://www-wds.worldbank.org/servlet/WDS_IBank_Servlet?pcont=details&eid=000104615_20041005091901

ANNEX 11: TIMETABLE OF KEY PROJECT PROCESSING EVENTS

Sequence	Timing
Time taken to prepare and process the project	
Identification and preparation mission	
Appraisal	October 9-12, 2004
Negotiations	November 22, 2004
Grant approval	November 30, 2004
Planned Effectiveness	December 2004
Planned Closing Date	June 30, 2006

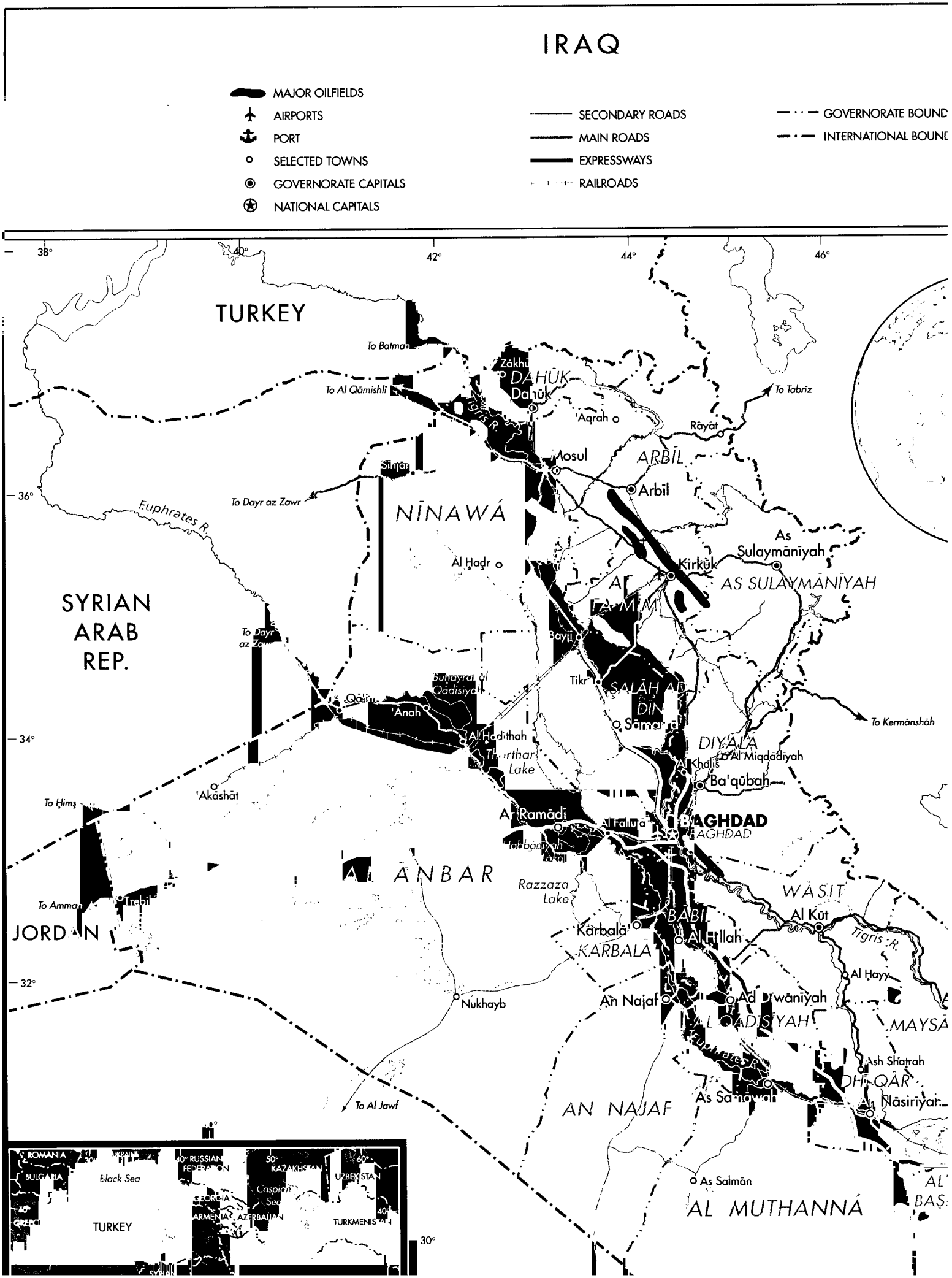
ANNEX 12: NAMES OF STAFF/CONSULTANTS WHO WORKED ON THE PROJECT

Names of staff/consultants who worked on the project

Name	Function
Jean Jacques Frere	Task Team Leader, Sr. Health Specialist
Virginia Jackson	Sr. Operations Officer/Consultant
Vasilios Demetriou	Sr. Implementation Specialist/Consultant
Majed El-Bayya	Sr. Procurement Specialist
Nazaneen Ismail Ali	Procurement Specialist/Consultant
David Webber	Lead Financial Management Specialist
Hiroko Imamura	Sr. Counsel
Ayman Abu-Haija	Sr. Financial Management Specialist
Ali Awais	Legal Counsel
Stefanie Brackmann	Environmental Specialist
Oroub El Abed	Social Scientist
Monica Larrieu	Health Specialist/Consultant
Walid Al-Tawil	Health Specialist/Consultant
Zeina Samara	Finance Analyst
Mira Hong	Operations Analyst
Dick Lindberg	Health Facility Planner/Consultant
Emma Etori	Language Program Assistant
Nancy-Jean Seigel	Team Assistant

Ad Hoc Advisory Committee

Name	Function
Joseph Saba	Country Director
Akiko Maeda	Health Sector Manager
Alfred Nickesen	Manager, OPCS Representative
Nadjib Sefta	Regional Procurement Advisor
Sherif Arif	Regional Environmental and Safeguards Advisor
Tufan Kolan	Portfolio Manager
Aloysius Ordu	Manager, Operations Services
Samia M'sadek	Regional Financial Management Manager
Faris Hadad-Zervos	Head of Mission, World Bank Iraq Office in Amman
Kathryn Funk	Sr. Country Officer
Hadi Abushakra	Chief Counsel
David Webber	Lead Finance Officer, Fiduciary Assurance
Colin Scott	Lead Specialist
Robert Bou Jaoude	Sr. Financial Management Specialist
Hiba Tahboub	Sr. Procurement Specialist
Olusoji Adeyi	Coordinator, Peer Reviewer, HDNHE
Janet Nassim	Senior Operations Officer, Peer Reviewer, HDNHE


IRAQ
MAJOR OILFIELDS
AIRPORTS
PORT
SELECTED TOWNS
GOVERNORATE CAPITALS
NATIONAL CAPITALS
SECONDARY ROADS
MAIN ROADS
EXPRESSWAYS
RAILROADS
GOVERNORATE BOUND
INTERNATIONAL BOUND
38°
40°
42°
44°
46°
36°
34°
32°
30°
TURKEY
SYRIAN ARAB REP.
JORDAN
To Batman
To Al Qāmishlī
To Dayr az Zawr
To Tabrīz
To Kermānshāh
To Ḥimṣ
To Amman
Irbil
Zākhū
DAHŪK
Dahūk
'Aqrah
Rāyāt
Mosul
ARBĪL
Arbīl
Sinjār
NĪNAWÁ
Euphrates R.
Al Ḥaḍr
As Sulaymānīyah
Kirkūk
AS SULAYMĀNĪYAH
AT TAMĪM
Bayjī
Tikrīt
SALĀḤ AD DĪN
Samarrā'
Buḥayrat al Qādisīyah
Qā'im
'Anah
Al Ḥadīthah
Thirthar Lake
'Akāshāt
DIYĀLĀ
Al Miqdādīyah
Khāliṣ
Ba'qūbah
Ar Ramādī
Al Fallūjah
BAGHDAD
AL ANBAR
Habbānīyah
Razzaza Lake
WĀSIT
Al Kūt
Tigris R.
BABIL
Karbalā'
Al Ḥillah
KARBALĀ'
Al Ḥayy
An Najaf
Ad Dīwānīyah
AL QĀDISĪYAH
MAYSĀ
Nukhayb
Euphrates R.
Ash Shaṭrah
DHĪ QĀR
As Samāwah
An Nāṣirīyah
To Al Jawf
AN NAJAF
As Salmān
AL MUTHANNÁ
ROMANIA
BULGARIA
GREECE
Black Sea
RUSSIAN FEDERATION
KAZAKHSTAN
UZBEKISTAN
Caspian Sea
GEORGIA
ARMENIA
AZERBAIJAN
TURKMENISTAN
TURKEY
SYRIA