

# PROSPECTS OF APPLICATION (BUILD- OPERATE- TRANSFER) BOT CONTRACTS TO DEVELOP INFRASTRUCTURES IN IRAQ

# (CASE STUDY – ELECTRICITY SECTOR)

By

Munqith Jameel Jubair

Supervisor

Assoc. Dr. Ibrahim A. Mohammed

This Thesis was Submitted in Partial Fulfillment of the Requirements for

the Master's Degree of Science in Engineering Projects Management

Faculty of Engineering

Isra University

May, 2017

#### **COMMITTEE DECISION**

This Thesis (Prospects of Application (Build- Operate- Transfer) BOT contracts to Develop Infrastructures in Iraq (Case Study –Electricity Sector) was Successfully Defended and Approved by:

Examination Committee

**Signature** 

Assoc. Dr. Ibrahim A. Mohammed (Supervisor) Faculty of Engineering Isra University

Prof. Dr. Basim Kadhim Jrew Faculty of Engineering Isra University

Prof. Dr. Mohammed Ahmed Heyasat Faculty of Engineering Balqa' University

### **ISRA UNIVERSITY**

### **AUTHORIZATION FORM**

I'm Munqith Jameel Jubair, Authorize Isra University to Supply Copies of My Thesis to Libraries or Establishments or Individuals on Request, According to Isra University Regulations.

Signature:

Date:

## **DEDICATION**

To ..... My Mother To ..... My Wife To ..... My Flowers (Sons) To ..... My Brothers and Sister 

Give Them My Achievement.

#### ACKNOWLEDGMENT

I would like to express my deepest gratitude to Dr. Ibrahim Al-Hadithi as my supervisor for a real and affective instruction to me during my research and he didn't prevent any advice or important instruction that assist me to complete my research in this perfectly, and I want to express about warmest thanks for Dr. Azhar Al- Rubie and Dr. Hussein Mohamed in Iraqi ministry of planning about a real advice and assistant in my research and providing us the document related on my research , also, we must not forget to thanks all the teaching staff in engineering college/ Isra university for their efforts during all the academic semesters, finally I would like to thanks all persons supporting me in my studying in valuable experience and knowledge and all persons stand with me in this critical stage of my life to get my successful, We ask Allah to mercy full this succeed and reimbursement us from missing in good placement.

# Prospects of Application (Build- Operate- Transfer) BOT Contracts to Develop Infrastructures in Iraq (Case Study –Electricity Sector)

Munqith Jameel Jubair

#### Abstract

This research look for the possibility to apply (Build- Operate -Transfer) BOT contracts to develop the infrastructure in (Iraqi electricity sector) I.E.S, so the existing problems were searched and determined in this sector, through the interviews with a specialized sample represented experts' persons. According to the interview results and after the analysis via using statistical parameters, and also according to the official documents for expenditures and performance for all the existing projects in Iraq, which were explained, it has been concluded that the real Iraqi electricity sector was too late and suffering from many problems related with a "financing, management, experience, economic and security".

The contribution of this research is to solve these problems in Iraq and to assist in developing this sector. Firstly, a specified questionnaire was employed to select the actual information about the BOT contract with its characteristics, secondly it has been selected and determined the real affecting factors on applying the BOT contract and also affecting on the development of the electricity sector, so according to the results , there were a sufficient information and ideas about the BOT contract but without a real and exact knowledge about all forms, moreover, the most effective factors on developing the electricity sector by using the BOT contract in Iraq were determined with a suitable and favorable base to apply this kind of contract because of the actual and urgent need to save and develop this sector by using available characteristics and advantages of the BOT

contract with all forms. Based on the requirements of each project in Iraq, a list of factors affecting on applying the BOT contract to develop this sector and BOT processing model and phases were suggested, in addition to, the factors were allocated according to each phase, and finally a (Strengths-Weaknesses- Opportunities- Threats) SWOT analysis was prepared for BOT contracts in I.E.S related to actual and real situation in this sector to be more clear and comprehensive.

Accordingly, for all these conclusions, it has been recommended to depend on the BOT contract with all suggested model and factors to develop infrastructure in Iraqi electricity sector included a multi important and deep procedures related, firstly with modification the investment laws and regulations that must be joined with the international conventions and agreements, secondly with a real promotion, conferences and training staff for this kind of contract and finally full review and modification for the existing financial and economic policies to be suitable with the next stage in the Iraqi development.

Key Words: Build- Operate- Transfer (BOT), Critical Success Factors (CSF), Iraqi Electricity Sectors (IES).