



قَالُوا سُبْحَانَكَ
لَا عِلْمَ لَنَا
إِلَّا مَا عَلَّمْتَنَا
إِنَّكَ أَنْتَ
الْعَلِيمُ الْحَكِيمُ

صدق الله العظيم
سورة البقرة الآية
(٣٢)

PERI-PROSTHETIC FRACTURES IN HIP ARTHROPLASTY

Thesis

Submitted for the partial fulfillment of M.D Degree in
Orthopedics

By

Gaber El-Sherbiny Hamed
M.B.,B.Ch, M.Sc., Orthopaedics

Under Supervision

Prof. Dr./ Mohamed Ahmed Mezied

*Professor of Orthopaedic Surgery
Faculty of Medicine, Ain shams University*

Prof. Dr./ El-Zaher Hassan El-Zaher

*Professor of Orthopaedic Surgery
Faculty of Medicine, Ain shams University*

Dr./ Ibrahim Mostafa El-Ganzory

*Assistant Professor of Orthopaedic Surgery
Faculty of Medicine, Ain shams University*

Faculty of Medicine
Ain Shams University
2012

Acknowledgment

First, I would like to thank Allah the merciful and compassionate for making all this work possible and for granting me with the best teachers, family, friends, and colleagues that many people would wish and dream of having.

I am honored to have Prof. Dr. Mohamed Ahmed Mezied, Professor of Orthopaedic Surgery, Faculty of Medicine, Ain Shams University, as a supervisor of this work. I am greatly indebted to him for his kind guidance and patience.

I am deeply thankful to Prof. Dr. El-Zaher Hassan El-Zaher, Professor of Orthopaedic Surgery, Faculty of Medicine, Ain Shams University, for his great help and effort to make this work possible. I was honored to work with him.

Words can not express my deep gratitude and sincere appreciation to Prof. Dr. Ibrahim Mostafa El-Ganzory, Assistant Professor of Orthopaedic Surgery, Faculty of Medicine, Ain Shams University, who assisted me in most of the work. I am greatly grateful for his generous help, kind advice, and kind guidance.

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List Of Abbreviations

1ry	Primary
Ap	Anteroposterior
BW	Body weight
CT	Computerized tomography
DCP	Dynamic compression plate
HHS	Harris his score
IV	Intravenous
J&J	Johnson & Johnson
LCP	Locking compression plate
LISS	Less invasive stabilization system
MRI	Magnetic resonance imaging
N-C	Normal to crack
N-N	Normal to neck
ROM	Range of motion
SGs	Strut grafts
STIR	Short T ₁ inversion recovery
Tc99	Technetium99
THA	Total hip arthroplasty
THR	Total hip replacement
WBC	White blood cells

INTRODUCTION

Periprosthetic fracture is a serious complications of total hip arthroplasty that can be difficult to treat and can be potentially fraught with complication⁽¹⁾.

Several categories of fracture can occur in association with hip arthroplasty. These include intraoperative fractures, intraoperative perforation of the femoral shaft, postoperative fracture of the proximal femur, traumatic and stress fractures of the femur and pelvis. As with most complications of hip arthroplasty, it is easier to prevent them than to treat sequelae⁽²⁾.

Intraoperative fractures commonly involve simple vertical splits that may occur during insertion of uncemented implants, or they may occur around the stem. The later commonly occur during revision surgery⁽³⁾.

The fracture that occur at the tip of the stem during surgery may be missed. The postoperative fractures are generally the result of an injury and are usually easy to diagnose because of pain and deformity of the thigh⁽⁴⁾.

Minor acetabular fractures probably occur more often than is recognized and the initial stability of the implant is not compromised⁽⁵⁾.

Many classifications can describe the pattern of the fracture and stability of the prosthesis. The most utilized classifications are Johansson and Vancouver classification⁽⁶⁾.

Periprosthetic fractures treatment is based on the site of fractures; implant stability and bone stock⁽¹⁾.