

**“AN AUDIT ON DIABETIC PATIENT UNDERSTANDING ON
TECHNIQUE OF INSULIN INJECTION IN HOSPITAL RAJA
PEREMPUAN ZAINAB II”**



**DIPLOMA OF PHARMACY IN THE
FACULTY OF PHARMACY,
UNIVERSITI TEKNOLOGI MARA,
PULAU PINANG**

PREPARED BY

NIK FARAHANA BINTI RUSLAN	2007292302
ROSLAN BIN MOHAMMAD	2007261384
MOHD SUPARDI BIN MOHD FOZI	2007262572

APRIL, 2010

ACKNOWLEDGEMENT

We wish to thank all those who in various ways have help to bring this project of the audit on technique of insulin injection into being. We express our gratitude to our preceptor Pn.Noor Haslina gently guided us through every stage of this project. We also appreciate the guidance and assistance of other Hospital Raja Perempuan Zainab (II) pharmacy staff, particularly En.osthman who gave us a great start, and also to the patients who is so kind to do the questioner.

It is our intention and hope that this project will improve the health of diabetic patient who use penfill insulin and well being of those we are privileged to serve. Finally we thank our families who's for forbearance love and support make all of our creative and endeavors both possible and worthwhile.

TABLE OF CONTENTS

Acknowledgement ii

Table of Contents iii

List of Tables iv

List of Figures v

Abstract vi

CHAPTER 1 INTRODUCTION 1

CHAPTER 2 LITERATURE REVIEW 2

CHAPTER 3 AIM AND OBJECTIVES 4

CHAPTER 4 MATERIALS AND METHODS 5

4.1 Study Design 5

4.2 Sample Selection 5

4.3 Data Collection 7

4.4 Data Analysis 9

CHAPTER 5 RESULTS AND DISCUSSION 10

5.1 Results 10

5.2 Discussion 22

CHAPTER 6 CONCLUSION 23

REFERENCES 24

APPENDIX A Questionnaire forms 25

ABSTRACT

The purpose of this project is to describe patient understanding in technique of pen fill insulin use and the role of insulin. In this study seems to be important as to know how deep knowledge of diabetic patient, factors influences, and parts should be focused for improvement. It has been run in Pharmacy Outpatient Department of Hospital Raja Perempuan zainab (II) for 2 months. We use patient questionnaire to collect data. If Before staff nurse also take part in patient counselling now only pharmacist will take care about patient counselling before use or do insulin injection. Content of the counselling should be focused to increase patient knowledge. Inadequate information and inappropriate technique in educating patient can lead to wrong patient practise. Only education level and counselling standing is appeared to be important in affecting patient knowledge compare to others demographic detail and patients' history such as age, race, education level, year of experience in taking penfill insulin, counselling standing from the survey we can indicated that, patient not really understand about diabetes, insulin and the right and complete technique to use penfiil insulin. Many of the patients are elderly and need proper counselling from trained personnel who pursue official guideline provided

INTRODUCTION

The incidence of diabetes is growing rapidly in the worldwide. Diabetes is a condition in which a person has a high blood sugar (glucose) level as a result of the body either not producing enough insulin, or because body cells do not properly respond to the insulin that is produced. Insulin is a hormone produced in the pancreas which enables body cells to absorb glucose, to turn into energy. If the body cells do not absorb the glucose, the glucose accumulates in the blood (hyperglycemia), leading to various potential medical complications.

Diabetics can be divided into two main groups based on their requirements for insulin, insulin-dependent diabetes mellitus (Type 1) and non-insulin-dependent diabetes mellitus (Type 2). Type 1 diabetes can occur at any age and the disease is characterized by an absolute deficiency of insulin caused by massive b-cell necrosis. For Type 2 diabetes it caused by inability of b-cells to produce appropriate quantities of insulin. Most diabetics are Type 2 and frequently over age 35.

To treat the diabetes, insulin therapy and oral hypoglycaemic agents are used. Insulin therapy refers to treatment of diabetes by administration of exogenous (injected) insulin. Patients with Type 1 diabetes mellitus depend on external insulin for their survival because the hormone is no longer produced internally. Some patients with Type 2 diabetes mellitus may eventually require insulin when oral hypoglycaemic agents fail to control blood glucose levels adequately.

The aim of the treatment is to achieve the best possible control of blood glucose concentration without making the patient obsession and to avoid disabling hypoglycaemia. If patients not adequate understanding in proper insulin therapy, it is hard to control the diabetes, affect patient's quality of life and enhance the cost of treatment.

The important of this project we can know level of patients understanding in proper insulin therapy. After that we can improve the level of patients understanding by teach them the proper technique in using of insulin.

The rational of this project are as follows:

1. We can know the level of patients understanding in proper insulin therapy.
2. We can help the hospital to decrease cost of insulin treatment.
3. Insulin need special storage and instruction, proper way of administration, and several precautions that patient should know to improve cost and clinical effectiveness and it need specific and appropriate counselling from pharmacy to achieve it.
4. To improve knowledge and understanding among diabetic patient in using insulin for their treatment.