Institute of Postgraduate Childhood Studies
Medical Studies Department for children

Study of Effect of Health Education Program on Adherence among Children with Persistent Asthma

A thesis submitted for Fulfillment of the Ph. D. Degree in Childhood Studies

(Child Health and Nutrition)

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2011

معهد الدراسات العليا للطفولة
قسم الدراسات الطبية للأطفال

دراسة دور برنامج تعليم الأطفال المصابين بحساسية الصدر طرق الإلتزام بالعلاج وأثره في تحسن صحة المريض

رسالة مقدمة للحصول على درجة الدكتوراه في قسم الدراسات الطبية
(صحة وتغذية الطفل)

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2011

Abstract

BACKGROUND: The goal of health education program offered to asthmatic children and their parents resulted in marked improvement in pulmonary function tests (FVC and FEV1) of asthmatic children and outcome of the disease (no. of cases =43, no. of control =42).

OBJECTIVE: The aim of this study was to evaluate the effectiveness of health education program on adherence among children with persistent asthma aiming to improve the pulmonary function tests.

SUBJECTS AND METHODS: The present study (intervention study) evaluated 85 asthmatic children, known and treated for bronchial asthma, and collected general data, medical history, questionnaire assessment, pulmonary function tests using Spirometry and health education program.

RESULTS: The results showed high statistical significant difference in pulmonary function tests (FVC and FEV1) of asthmatic children between pre and post health education program and follow up. As regard FVC the total mean of (89.84 ± 11.97) after program compared to (72.84 ± 16.02) before program (t= 12.80, p-value <0.001) as regard

FEV1the total mean of (107.54± 6.55) after program compared to (98.74 ± 15.57) before program where (t=3.62, p<0.001).

CONCLUSIONS: Health education to asthmatic children was an essential component of successful asthma management through improvement of pulmonary function tests.

Keywords:

Health Education Program – adherence – pediatric asthma

Acknowledgment

First and for most, thanks are all to "*Allah*", the Most Beneficial, Merciful, the Most Gracious and without his help this work couldn't be completed.

I would like to express my sincere gratitude and respect to my ***Professor Dr. Medhat Hassan Shehata***, Professor of Pediatrics – Institute of Postgraduate Childhood Studies – Ain Shams University, for his mostly and valuable advice and kind supervision throughout the whole work.

I would like to express my sincere gratitude to ***Professor Dr. Tharwat Ezzat Deraz***, Professor of Pediatrics – Faculty of Medicine – Ain Shams University for his kind supervision, wide guidance and continuous support.

I am particularly indebted to ***Professor Dr. Ehab Mohamed Eid***, Professor of Public Health – Institute of Postgraduate Childhood Studies – Ain Shams University for his meticulous supervision, continuous support, honest assistance and unlimited help throughout the whole work.

No words of gratitude would be enough to express what I owe to my family. They have been there every step of the way and to them I dedicate every achievement. Extend my thanks to patients and their families for their valuable help and cooperation throughout the work.

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83	6	(Table 3)	(Table 4)
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106	21	(table 8)	(table 9)
111	12	b2	β2
133	7	the ophylline	theophylline
183	4	marked improvement	no difference
185	4	marked improvement	no difference
203	5	(table 13)	(table 12)
203	18	(table 16)	(table 15)
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206	7	(table 15)	(table 14)
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217	18	Clark s	Clark's
218	5	(7 questions)	(8 questions)
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List of Abbreviations

ACT	Asthma Control Test
ADCs	Airway dendritic cells
AHR	Airway hyper-reactivity
AIA	Aspirin-Induced Asthma
AIT	Allergen immunotherapy
APR	Acute phase response
ASM	airway smooth muscle
BAL	Broncho Alveolar Lavage
BHR	bronchial hyper-responsiveness
BMI	Body Mass Index
BTS	British thoracic society
CAMP	Childhood Asthma Management Program
CO	carbon monoxide
COPD	Chronic obstructive pulmonary disease
DALYs	disability-adjusted life years
DC	dendritic cell.
DEP	Diesel exhaust particles
EAR	Early allergic response
ECG	Elctrocardiography
EIA	Exercise-induced asthma
EIB	exercise-induced broncho-constriction