## UNIVERSITY OF RUHUNA FACULTY OF MEDICINE



## THIRD EXAMINATION FOR MEDICAL DEGREES PART II, 03rd DECEMBER 2007 COMMUNITY MEDICINE PAPER I

Answer ALL FIVE questions
Answer each part in a SEPARATE book

Time: 09.00am – 12noon Duration: Three Hours

<u> </u>	1 - 117-1		•	
""是"种"。	THE STAN BE SHEET	:	<del></del>	<del></del>
1 in sulfitte	<u>Par</u>	<u>t A</u> .		
1.1 1.1.1	Define Life Expectancy (LE) and describ	o how I to be himb dice.		
	from LE at age one year and reasons for	ie now re at bitth dille	rs	
	prompte de age one year and reasons (c	or such differences.		(25 marks)
11/2	Write notes on "Dependency Ratio".			
130	terms notes on Dependency Radio .		•	(25 marks)
· . · · · · · · · · · · · · · · · · · ·				
1.2 "Agric	ultural workers in Sri Lanka are suscentil			
Com	ultural workers in Sri Lanka are susceptil ment on the above statement.	ole to occupational haz	ards"	
- man Harry	sicit on the above statement.			, (50 marks)
4 -44. 1 - 5.88.11 .	is the second of			
- 4		•		
•	n de Part	<u>B</u>		
2				
2.1 (2.1.1)	Discuss the importance of nutrition inter	vention in school child	en.	(30 marks)
5.69%。1.2,1.2	What are the factors influencing vitamin	A deficiency in adults	•	(20 marks)
and the state of the		The section of the dedical		(20 marks)
en ting terminal lines on the Marin Pate.	Wild the second of the second			
2.2 "The a	ir quality in developing countries has del	teriorated over the nac	h 6a	
deça	ies.".	certorated over the pas	t lew	
2.2.1	List the reasons for deterioration in air of	rualibula davidanta		
2.2.2	Briefly describe the adverse health effect	duality in developing co	untries.	(15 marks)
	inversity despends and adverse Health ellect	its of air politition,		(35 marks)
			1	
TO PROTECT SERVICE	Part		, .****	A, (_A
( <b>`3.</b> 🌂	production of the last of the	<u>v</u>		
3.1 3.1.1	Describe the Implementation of Well IV.	OI! 1 P	N.	
	Pescribe the Implementation of Well Won	nen Clinic Programme	n Sri Lanka,	
	programa i na marina da la		d) dri	(30 marks)
			7.	
7-2 - 7 - 1	List the strengths and limitations of the	programme.	* ; • • • • •	(20 marks)
3.2,3.2.1	What are the same		<i>.</i>	•
يربي بيرين	What are the functions of the Central E	pldemiological Unit of :	Sri Lanka.	(20 marks)
				•
:	Several patients with fever and vesicula	r rash were admitted to	many hospit	als
150 1618	in the daile district during past two wea	eks.		
Service right has been	Describe what you would do in such a c	situation. If you are th	Δ '	
र्रोजेल्या १० केल्या ।	Regional Epidemiologist of the area.	- you are th	<b>.</b>	(20 marks)
	1			(30 marks)
in Lindy	A Some in the		A Comment of the Comm	
		·	51	
				•
	1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1			· Control

## <u>Part`D</u>

4. 4.1 List five measures of dispersion and describe them briefly.

(20 marks)

4.2 Describe giving examples.

4.2.1 a continuous variable

4.2.2 a binary variable

(5 marks) (5 marks) (20 marks)

4.2.3 sampling methods

4.3 A study was conducted in Galle to identify the association, if any, between maternal rubella and congenital cataract. A sample of 30 children with the defect, and a sample of 35 children of similar background and age who did not have the defect were selected. Fifteen mothers having children with the defect and 10 mothers having children without the defect had rubella while carrying the child.

4.3.1 Write the null and the alternative hypothesis to test for the association. 10 marks)

4.3.2 Test the null hypothesis at the probability level of 0.05.

(40 marks)

x 2 table

Two-sided signifiance level	0.10	0.05	0.02	0.01
d.f.		Critical value	ue x ²	
1	2.706	3.841	5,412	6.635
2	4.605	5.991	7.824	9.210
3	6.251	7.815	9.837	11.345
. 4	7.779	9.488	11.668	13.277
5	9.236	11.070	13.388	15.086

## Part E

· 養養 List five

ha beach

6.76

4.50

11.16 . C. 7,753 (5 . ...v:F

. . . . .

and Kich. San Strain Line, Hills

> of no 1.101...

5.1 A researcher wants to find out the level of physical activity and risk of myocardial infarction (MI) among males of 50 - 70 years age. He selected 100 patients admitted to cardiology unit with MI and selected a control group of 100 individuals of same age group from hospitalized patients. He used a physical activity index of more than 2500 kcal/day (A) for this purpose as the suspected risk factor. Other confounders were controlled and the study was performed.

The study revealed that out of 100 cases and 100 controls 30 and 60 belonged to physical activity index of A respectively. Comment on this suspected factor(A).

(50 marks)

5.2 Describe a cohort study design. What are the advantages and disadvantages of this désign.

(50 marks)