

INDOOR ENVIRONMENT QUALITY (IEQ) FACTORS

HOMEWORK 8

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Isabell Rumrich

Stefania Caporaso

CONTENT

- Introduction
- The ALPAC study
 - Aim
 - Methods
 - Results
 - Conclusions
- Relation to a wider perspective
- Incooperation into bigger picture

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INTRODUCTION

3

INDOOR ENVIRONMENT QUALITY (IEQ) FACTORS

- Factors affecting the indoor environment quality
 - Environmental
 - Psychological
- Dose Response expressed as Relative Risk Ratios

RELATIVE RISK (RR)

- Risk of an event relative to an exposure
- Expressed as ratio of probability of the event occurring in the exposed versus an non-exposed group
- Odds Ratios: measure of effect size; describes strength of an association

THE ARTICLE

- **Child maltreatment in the “Children of the Nineties:” deprivation, class, and social networks in a UK sample**
- Peter Sidebotham, Jon Heron and Jean Golding
- Child Abuse and Neglect; Volume 26;2002, Pages 1243-1259
- ALSPAC Study



THE ALSPAC STUDY

7

AIM

- To determine risk factors for child maltreatment within the socio-economic environment of a contemporary UK child population

METHODS

- Avon Longitudinal Study of Parents and Children
- 14,256 children (115 identified as placed on local child protection registers prior to their 6th birthday)
- Data on the socio-economic environment obtained from questionnaires
- Risk factors analyzed using logistic regression analysis

RESULTS I

Exposure metric	Exposure unit	ERF parameter	ERF	ERF Confidence Interval
Maternal employment	No/yes	OR	2.82	1.59 – 5.00
No. of house moves in previous 5 years	2-3 vs. 0-1	OR	1.32	0.77 – 2.27
No. of house moves in previous 5 years	4 or more vs. 0-1	OR	2.81	1.59 – 4.96
Social Network Score < 21	Yes/no	OR	3.09	1.84 – 5.19
Overcrowded accomodation	Yes/no	OR	2.16	1.27 – 3.70
Accomodation	Council vs. owned/mordgaged	OR	7.65	3.30 – 17.75
Accomodation	Rented vs. owned/mordgaged	OR	4.47	1.82 – 10.98
Paternal employment	No/yes	OR	2.33	1.43 – 3.77
Car use	No/yes	OR	2.33	1.41 – 3.83

RESULTS II

No. Of indicators	ERF parameter	ERF	ERF Confidence interval
0	OR	1.00 (reference)	
1	OR	9.58	2.64-34.81
2	OR	23.44	6.61-83.15
3	OR	59.30	17.52-200.76
4	OR	111.36	32.31-383.801

PRECISION AND PLAUSABILITY

- Definition of maltreatment: registration for physical injury, neglect, sexual abuse, emotional abuse
- Measurement of the social class not too accurate
- Complex nature of relationship with child maltreatment
- Parental income not measured directly
- Controlling for social factors
- Large amount of prospectively data
Participation lower among the maltreated group
- Risk of social bias and no way of measuring

CONCLUSIONS

- Importance of social factors in the etiology of child maltreatment
- Social deprivation is an important determinant of child maltreatment
 - encompasses a number of different aspects



RELATION TO A WIDER PERSPECTIVE

14

- Study as part of a wider ecological study of risks factors for child abuse
- Exploring of wider social domains or "exosystem" within which maltreated children and their families are located



INCOOPERATION INTO BIGGER PICTURE

16

- The results of the study can be used for risk management
- Strategies are needed that will respond to individual circumstances and aim to support vulnerable families
 - The role of social networks and support cannot be ignored

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THANK YOU!

Any questions?