

Erasmus MC

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Exposure of toddlers (11-18 months old) to fall and poisoning hazards in the home

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Objective

No information and numbers on safety preventive behaviours of parents in the Netherlands

Goal:

Exploration of the presence and use of two preventive measures in Dutch households with young children, and differences in use according to socio-demographic characteristics

Methods I

Focus on two frequent accident categories among young children (1-2):

- Fall from stairs
 - Poisoning (household products & medication)
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- Cross-sectional survey
 - Self-administered questionnaires
 - 2470 Parents of children 11-18 months old in caseload of 6 different preventive youth healthcare providers

1722 questionnaires (70% response rate)

Respondents

Characteristics	(%) (Unless otherwise specified)
Mean age respondent (years)	32.4 (SD4.5) Range 16-60
Education level mother is low	1037 (61.1)
Education level father is low	1046 (62.5)
Mother not employed	521 (31.0)
Father not employed	54 (3.2)
Mother Non-Dutch ethnicity	101 (5.9)
Father Non-Dutch ethnicity	94 (5.5)
Lone parent	33 (1.9)
One child	736 (42.7)
Mean age child (months)	13.5 (SD 1.4) Range 11-18
Boy	901 (52.7)
Child can walk independently	811 (47.5)
Previously medically attended unintentional injury	123 (7.3)

Results | Fall from staircases

- Overall 81% of the parents has at least one absent stair gate
- 79% gate at the top of staircase
- 35% gate at the bottom of staircase
- 56% with gate at the top does not always use (close) the gate

Results II Poisoning

- 50% exposed to unsafe storage of possible poisonous substances
- Medications stored safe more often
- Kitchen location most unsafe
 - storage
 - supervision

Results III

Odds ratios (ORs) and 95% confidence intervals (95% CI) [missing data points].

	No safety gate bottom stairs (n=1063)	No safety gate top stairs (n=337)	Medication stored unsafe (n=427)	Cleaning products stored unsafe (n=658)
Age child [20]				
11-13 (n=877)		1.30 (1.01-1.69)		
14-18 months (n=825)		1.00		
Child can walk [14]				
No (n=897)				1.30 (1.06-1.60)
Yes (n=811)				1.00
Number of children [10]				
One (n=736)	1.61 (1.30-2.00)	1.89 (1.46-2.44)	2.48 (1.97-3.12)	2.04 (1.66-2.50)
Two or more (n=976)		1.00	1.00	1.00
Education level mother [25]				
Low (n=1037)			0.74 (0.58-0.93)	
High (n=660)			1.00	
Education level father [47]				
Low (n=1047)		1.34 (1.02-1.75)		0.74 (0.60-0.91)
High (n=628)		1.00		1.00
Mother employed [43]				
No (n=522)	0.69 (0.56-0.87)		0.78 (0.58-0.99)	
Yes (n=1157)			1.00	
Ethnicity mother [17]				
Other (n=101)		3.65 (2.26-5.88)		1.77 (1.13-2.77)
Dutch (n=1604)		1.00		1.00

Unsafe storage: not stored in a locked cupboard or at adult eye level or above.

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Conclusion

- Young children in the Netherlands are exposed to possible hazards in the home
- Differences in the presence and use of preventive measures by socio-demographic characteristics may be useful in the prevention of accidents
- Safety behaviour should not be generalised

Variables in analysis

- Age child
- Gender child
- Child can crawl
- Child can walk independently
- Number of children in household
- Educational level mother
- Educational level father
- Mother employed
- Father employed
- Ethnicity mother
- Ethnicity father
- History with medically attended injury