UNINFECTED CHILDREN OF HIV+ MOTHERS IN THE UNITED STATES: INDIVIDUAL AND CONTEXTUAL VULNERABILITY AT SCHOOL ENTRY

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ABSTRACT

Objective: To examine individual and contextual vulnerability factors at school entry among the children of HIV+ mothers in the United States.

Background: There are nearly 100,000 HIV+ women of childbearing age in the U.S. During the past five years, a precipitous drop in the rate of perinatal transmission has resulted in an increase in the number of uninfected children born to HIV+ mothers.

Design/Methods: This ongoing, longitudinal study has enrolled 94 4-6 year old children from three study groups matched for age, race, gender and grade level: HIV+ children, HIV- children born to HIV+ mothers, and healthy children born to HIV- mothers. Child, family and contextual vulnerability factors were ascertained using standardized questionnaires and instruments, and adrenocortical activation was measured with pre- and post-school entry measures of salivary cortisol.

Results: The uninfected children of HIV+ mothers are an important and understudied sub-population at school entry. These children were more likely to live with their biological mothers than Group A or C subjects, (Group B, n=21); and healthy children of HIV- mothers (Group C, n=47). Child, family and demographic vulnerability factors were ascertained using standardized questionnaires and instruments, and adrenocortical activation was measured with pre- and post-school entry measures of salivary cortisol.

Conclusions: The uninfected children of HIV+ mothers are at risk on multiple levels. Further exploration of their outcomes should address both biological and social vulnerabilities of this growing sub-population.

STUDY DESIGN (N=94)

- Group A: HIV+ children, HIV+ mothers (26%)
- Group B: HIV+ children, HIV- mothers (27%)
- Group C: HIV- children, HIV- mothers (37%)

RESULTS

CHILD LIVING WITH BIOLOGICAL MOTHER

MAJOR LIFE EVENTS

During 6 Months Before Starting School

GROUP A GROUP B GROUP C

UNEMPLOYED MOTHERS

% Mother Employed

ANNUAL FAMILY INCOME <$10,000

% Income <$10K

INTELLIGENCE TESTING

SUMMARY

AT SCHOOL ENTRY, THE UNINFECTED CHILDREN OF HIV+ MOTHERS...

- lived in families with fewer resources and had more recent stressful events,
- were less likely to live with their biological mothers than Group A or C subjects,
- had the lowest salivary cortisol levels after starting school

CONCLUSIONS

- The uninfected children of HIV+ mothers are disadvantaged and vulnerable despite being spared HIV-related disease
- More knowledge of HIV-affected children is needed to guide health and preventive care, and outreach efforts for this growing sub-population of the HIV epidemic.

Research Question

How does the stress of starting school impact the infected and uninfected children of HIV+ mothers and their uninfected children? Do these children differ in family environment, intelligence testing, and cortisol stress response?

Background

- HIV+ women are a growing risk group in the AIDS epidemic.
- Perinatal transmission is down 50% over 5 years so more HIV- children born to HIV+ mothers.
- Starting school is a normative stressor for all children.

Method

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