#### ABSTRACT SUBMISSION FORM

LET'S TALK ABOUT



Exploring the role of sex and gender on health research





# **CHRD 2020: Abstract Submission Form**

#### **Submitter Name**

Keely Loewen

#### **Email**

kloewen6@manitoba-physicians.ca

#### Title

Prenatal Diet and Infant Sensitization in the CHILD Cohort

#### **Background**

Early introduction of highly-allergenic foods has been associated with decreased risk of sensitization and allergy.

#### **Objective**

We examined associations between maternal diet during pregnancy and infant sensitization to egg, peanut, cow's milk, and dust mites.

#### **Methods**

CHILD participants were recruited from the general population before birth. Maternal diet, including frequency of egg consumption, was reported prenatally. Infant diet was reported at birth and every 3-6 months. At ages 1 and 3 years, sensitization to allergens, including egg, peanut, cow's milk, and dust mites, was measured by skin prick testing. Atopic dermatitis was diagnosed clinically starting at age 6 months. Multivariable logistic regression was used to examine associations between maternal prenatal consumption of egg and other food allergens, timing of infant dietary introduction of food allergens, and child sensitization to egg, peanut, cow's milk and dust mites.

#### Results

CHILD participants were recruited from the general population before birth. Maternal diet, including frequency of egg consumption, was reported prenatally. Infant diet was reported at birth and every 3-6 months. At ages 1 and 3 years, sensitization to allergens, including egg, peanut, cow's milk, and dust mites, was measured by skin prick testing. Atopic dermatitis was diagnosed clinically starting at age 6 months. Multivariable logistic regression was used to examine associations between maternal prenatal consumption of egg and other food allergens, timing of infant dietary introduction of food allergens, and child sensitization to egg, peanut, cow's milk and dust mites.

#### Conclusion

Children were more likely to be sensitized to egg, peanut, and cow's milk if their mothers ate egg daily during pregnancy, even after accounting for age of egg introduction into the infants' diets. Further research should explore possible mechanisms of these associations.

### Theme:

Clinical

### Do you have a table/figure to upload?

No

### Are you willing to participate in Goodbear's Den?

Yes

### **Presenter Status:**

Residents

## What was your role in the project?

contributed to the study design, conducted the data analysis, and wrote and revised the abstract

# **Authors**

Name	Email	Role	Profession
Keely Loewen	kloewen6@manitoba- physicians.ca	Presenting Author	Resident
Theo J. Moraes	theo.moraes@sickkids.c a	Co Author	Associate Professor
Stuart E. Turvey	sturvey@bcchr.ca	Co Author	Full Professor
Piush J. Mandhane	mandhane@ualberta.ca	Co Author	Associate Professor
Malcolm R. Sears	searsm@mcmaster.ca	Co Author	Professor Emeritus
Padmaja Subbarao	padmaja.subbarao@sick kids.ca	Co Author	Associate Professor
Allan B. Becker	allan.becker@umanitoba .ca	Co Author	Full Professor
Meghan B. Azad	meghan.azad@umanitob a.ca	Co Author	Assistant Professor
Elinor Simons	elinor.simons@umanitob a.ca	Co Author	Assistant Professor