Factors associated with breastfeeding among women with prepregnancy diabetes: An exploratory study

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#### **Research Team**



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#### Background



- Breastfeeding has well recognised maternal, infant and public health benefits<sup>1</sup>
- The World Health Organisation recommends exclusive breastfeeding for babies to six months of age<sup>2</sup>.
- Compared to women without pre-existing diabetes, among women with type 1 and type 2 diabetes:

□ breastfeeding rates are lower<sup>3</sup>

 $\Box$  duration of breastfeeding is shorter<sup>4</sup>

• Not much is known about individual and social factors that are associated with breastfeeding among women with type 1 or type 2 diabetes.









To identify physical, social, psychological and cultural factors associated with breastfeeding at 3 months post-birth among women with type 1 and type 2 diabetes







- Ethics approval from Deakin University and each hospital
- Women with type 1 or type 2 diabetes were recruited from obstetric and diabetes clinics at three metropolitan hospitals in Melbourne, Australia.



• All participants provided written informed consent.







- Women completed surveys during <u>pregnancy</u> (30-34 weeks gestation)
  - □ Face-to-face with a member of the research team at a scheduled hospital consultation
  - Survey included questions about demographic and reproductive factors, and women's intention to breastfeed to at least 3 months postpartum: Infant Feeding Intentions Scale<sup>5</sup>
- Follow-up surveys at <u>3 months post-birth</u>
  - Over the phone with a member of the research team
  - Survey included questions about birth, current breastfeeding, social and health professional support
    Western Health





Of the 102 pregnant women who were invited to participate,

• 79 (77.5%) women completed the survey during pregnancy (Mean gestation 31.5 weeks)

	n (%)	Mean (SD, Range)
Participant age		33.3 (5.1, 20 - 43)
Born in Australia	43 (54%)	
Tertiary education	62 (79%)	
Married / Living with	70 (89%)	
partner		
First child (primiparous)	30 (38%)	
Diabetes type		
Type 1	38 (51%)	
Type 2	37 (49%)	

• 47 (59.5%) also completed surveys at 3 months post-birth (Mean infant age 13.4 weeks)



# **Results (cont.)**



- At 3 months post-birth, 68.2% of women were still breastfeeding (exclusive or any)
- The following factors were <u>not</u> significantly associated with breastfeeding :

Demographic variables

Parity

□ Type of diabetes

□ NICU admission

□ Social and health professional support

• Only intention to breastfeed to at least 3 months (assessed during

8 pregnancy) was <u>significantly associated</u> with breastfeeding at 3 months Deakin University CRICOS Provider Code: 001138

### Discussion



- Breastfeeding rates consistent with Australian prevalence (69%, 4 months post-birth)<sup>6</sup>
  - Australian healthcare system offers good postnatal clinical support to facilitate breastfeeding among women both with and without diabetes
- Study strengths:
  - Assessed a broad range of factors which may be associated with breastfeeding
  - Intention to breastfeed was assessed <u>during pregnancy</u>, other studies have assessed it retrospectively or post-birth<sup>8-10</sup>
- Study limitations:
  - □ Small sample, difficult to recruit
  - □ No control group (without pre-existing diabetes)





# Implications



- Intention to breastfeed is a known predictor of breastfeeding among women in general<sup>5-7</sup> - these findings demonstrate that among women with type 1 or type 2 diabetes the importance of intention to breastfeed outweighs other potential predictors of breastfeeding at 3 months postbirth.
- Health care providers caring for women with type 1 or type 2 diabetes during pregnancy, have the potential to:
  - Educate women about the importance of breastfeeding
  - □ Support their breastfeeding intentions





# Acknowledgment



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#### **References & Acknowledgments**



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