

# POSTNATAL CARE AND NEWBORN FEEDING PRACTICES IN 15 SUB-SAHARAN AFRICAN COUNTRIES

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# Introduction – Newborn feeding

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- Newborns reap many benefits from early and exclusive breastfeeding
  - Reduce under nutrition and mortality
  - Improve newborn immunity
  - Reduction of diarrhoeal disease
  
- Prelacteal feeding (feeds other than breastmilk in the first few days of life)
  - Increase risk of diarrhoeal disease
  - Reduced maternal milk production

# Introduction – Postnatal care

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- Recent call by WHO-UNICEF to improve Postnatal Care (PNC) for all newborns
- PNC for improved survival and health
- Some elements of PNC:
  - Promotion of early and exclusive breastfeeding
  - Thermal care
  - Hygienic cord care
- PNC literature based on trials and interventions. What about customary care?

# Research question

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- Is PNC associated with newborn feeding practices?
  - Hypothesis 1: *PNC is associated with higher levels of early initiation of breastfeeding*
  - Hypothesis 2: *PNC is associated with lower levels of prelacteal feeds*
- Aux. analysis: Are all provider types (trained and untrained) suitable to provide PNC?
  - *Hypothesis: Only trained providers are suitable to provide PNC*

# Data

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- Demographic and Health surveys data from 15 sub-Saharan African countries
- *Outcomes:*
  - *Breastfeeding within 1 day*
  - *Prelacteal feeds (within first 3 days of life)*
- *Independent variable:*
  - *PNC within 1 day*

# Methods

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- Multi-level, multivariate models for two binary outcomes
  - Adjusts for clustering of data within countries
  - Adjusts for individual and country-level characteristics and correlates
  - Individual correlates: age, birth interval, parity, C-section, ANC, Skilled delivery, tetanus toxoid, education, marital status, media access, wealth, residence
  - Country correlates: GDP per capita, expenditure on health, density of physicians and nurses, HIV prevalence.

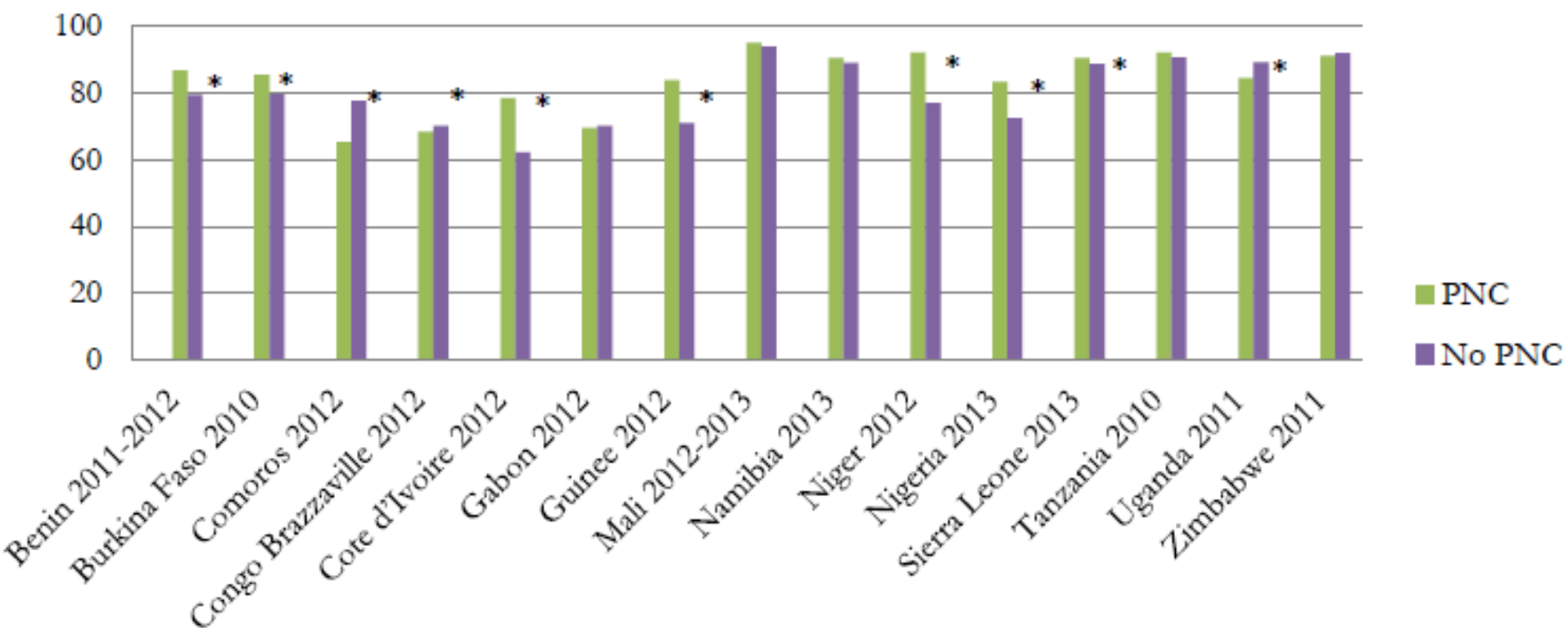
# Results

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- Breastfeeding within 1 day: 81% (range: 66-94%)
- Prelacteal feeds: 39% (range: 11-65%)
- PNC within 1 day: 15% (80% provided by nurses)

# Bivariate results

Percentage of newborns breastfed within 1 day of birth by post-natal care within 1 day

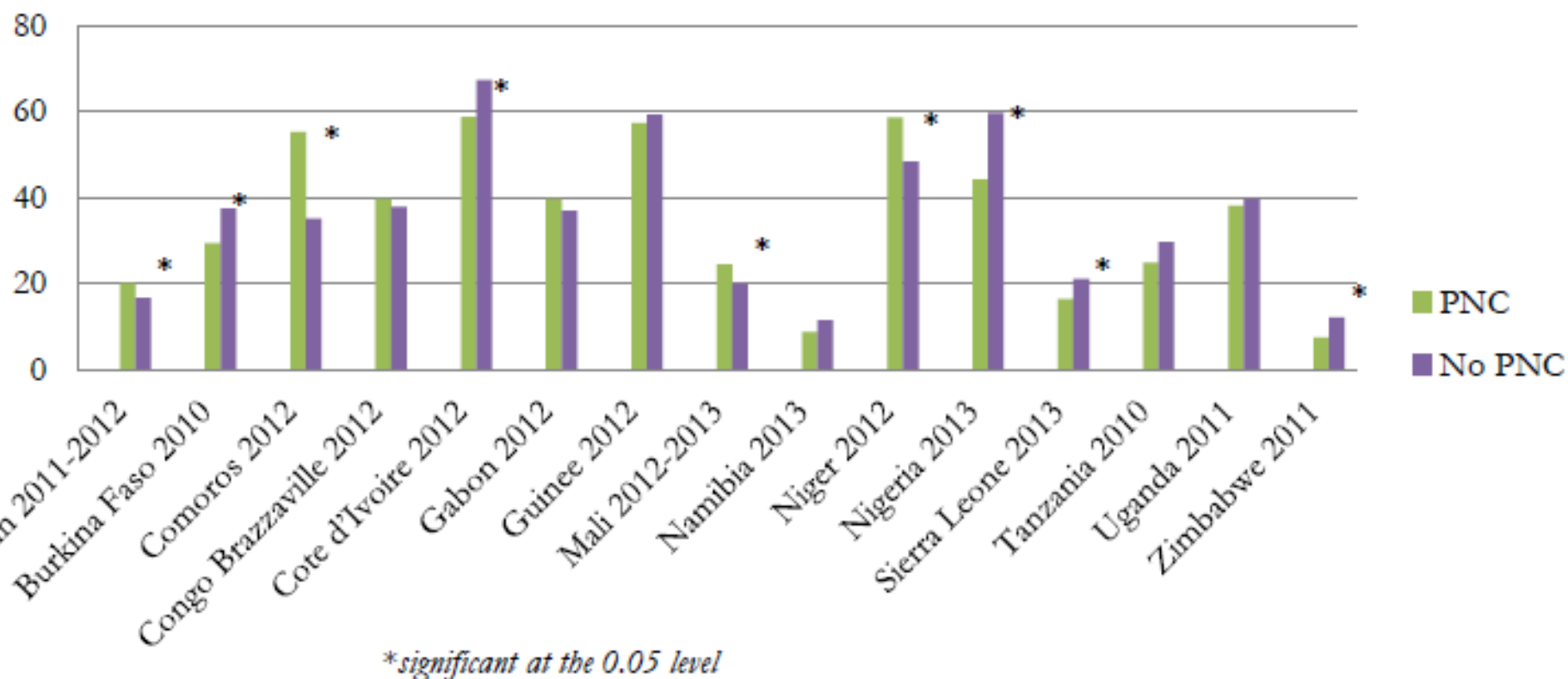


*\*significant at the 0.05 level*



# Bivariate results

Among ever breast-fed newborns, percentage who had a prelacteal feed by post-natal care within 1 day of birth



## Multivariate results

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- PNC within 1 day significantly associated with breastfeeding within 1 day  
OR: 1.35, *p-value*: 0.000, 95% CI: 1.27-1.44
- Provider of PNC significantly associated with breastfeeding within 1 day (except for physicians)
  - Physicians: OR: 0.93, *p-value*: 0.269, 95% CI: 0.81-1.06
  - Nurse/Midwife: OR: 1.39, *p-value*: 0.000, 95% CI: 1.29-1.50
  - TBA/CHW/Other: OR: 1.95, *p-value*: 0.000, 95% CI: 1.60-2.36

## Multivariate results

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- PNC within 1 day not significantly associated with breastfeeding within 1 day
  - OR: 1.04, *p-value*: 0.195, 95% CI: 0.98-1.09
- Provider type: no association with prelacteal feeds except for
  - TBA/CHW/Other OR: 1.20, *p-value*: 0.017, 95% CI: 1.03-1.39

# Implications: take home messages

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- PNC through customary care can improve breastfeeding within 1 day
- Need to further tailor PNC to reduce prelacteal feeds, and hence, increase exclusive breastfeeding
- Trained and untrained persons can provide PNC to improve breastfeeding within 1 day: low cost, new opportunities to engage TBAs, CHWs

# Limitations & ongoing work

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- Low levels of PNC within 1 hour
- PNC content not known
  - UNICEF testing of PNC content questions in Nov: Belize MICS field test
- Gap in skilled delivery and PNC: real or not?
  - DHS: short set of questions
  - MICS: elaborate and more detailed questions
  - Points to potential issue in DHS data
- Further analysis of MICS data on PNC

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## For more information, please contact

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