**Background**

Population: 1283 urban dwelling pregnant women, 18 years of age and older, screened at 10 clinics in Brazzaville, Congo. Study participants were approached during regular prenatal care visits.

Data Collection: Trained local screeners utilized the 1-Question Screen, a validated, in-office method to identify self-reported prenatal alcohol use. Participants were asked to describe “1 drink” as a part of this study.

**Methods**

**Estimation Formulas:**

- Estimated Total Drinks = (Reported Drinks per Day x Drinking Days per Week) x Gestational Weeks
- Estimated Total Binges = (If Reported Drinks per Day >3= Drinking Days per Week) x Gestational Weeks

**Adjustment Formulas:**

- Adjusted Number of Drinks per Day = Reported Drinks per Day x 1.381592
- Adjusted Estimated Total Binges = (Adjusted Number of Drinks per Day x Drinking Days per Week) x Gestational Weeks

**Binge Episode:** 3 or more drinks at a time

**Goals**

1. Provide an additional estimate of PAU in this population.
2. Provide an estimate of an adjusted number of alcoholic drinks consumed by pregnant women in Brazzaville, Congo.
3. Provide an estimate of binge episodes in pregnancy by pregnant women in Brazzaville, Congo.

**Comparison of Risk Groups**

- **Reported alcohol use by risk group**
  - Total Population (n=1283)
  - Low Risk (n=59)
  - At-Risk (n=59)
  - High Risk (n=173)

**Definitions**

- **Birth Rate:** 36 per 1000 (52nd Highest)
- **Premature Birth Rate:** 167 per 1000 (2nd Highest)
- **Infant Mortality:** 74.2 per 1000 (17th Highest)
- **Prenatal Alcohol Use:** 23.3% of Pregnancies
- **Prenatal Smoking:** 5.5% of women

**Infant Mortality:** 167 per 1000 (2nd Highest)

**Population Reference Bureau, 2011**

**Birth Rate:** 36 per 1000 (52nd Highest)

**infant mortality**

**Prenatal Alcohol Use:** 23.3% of Pregnancies

**Prenatal Smoking:** 5.5% of women

**Estimates of Total Binge Episodes**

- **Estimated Number of Total Drinks**
  - Adjusted Estimated Total Drinks to Screening Date
- **Comparison of Risk Groups**
  - Reported alcohol use by risk group
    - Total Population (n=1283)
    - Low Risk (n=59)
    - At-Risk (n=59)
    - High Risk (n=173)

**Binge Episode**

3 or more drinks at a time

**No Risk Pregnancy:** No reported alcohol use or quit before pregnancy

**At Risk Pregnancy:** Quit using alcohol upon pregnancy recognition

**High Risk Pregnancy:** Continued using alcohol after pregnancy recognition

**Discussion**

- Three recent reviews of future studies of prenatal alcohol use identified the differences between researchers’ understanding of “1 drink” and the population’s perceived definition of “1 drink.” By using an adjusted formula, we are able to more accurately estimate prenatal alcohol exposure.

- **Estimated Number of Total Drinks**
  - Adjusted Estimated Total Drinks to Screening Date

**References**

- Improving Estimates of Prenatal Alcohol Use in Brazzaville, Congo