

# Demographic Disparities in CVD Risk Among Nigerian University Students

A cross-sectional analysis of 1,300 students from two universities in North-Central Nigeria

**1,300**

Students Enrolled

**2**

Universities

**62.1%**

Mean CVD Knowledge Score

**22.6%**

Good Knowledge ( $\geq 80\%$ )

## 🕒 Modifiable Risk Factor Prevalence (Low but Present)

**2.2%**

Current Smoking

**3.7%**

Alcohol Use

**6.7%**

Hypertension

**1.4%**

Diabetes

**14.6%**

Family History

### 👨‍🎓👩‍🎓 Gender Disparities

**-6.3%**

⬇️ Males score lower than females in CVD knowledge (NSUK) p=0.002

*No difference in risk perception or behavioral intentions*

### 🛐 Religious Influences (PARADOX)

**-5.9%**

⬇️ Muslims: Lower knowledge p=0.008

**+2.4%** ⬆️ Muslims: Higher risk perception p=0.007

### 📚 Academic Level Paradox

**-1.2%**

⬇️ Per academic level increase in exercise intentions p=0.003

Year 1: 81.1% → Year 5: 76.8% readiness

### 👨‍👩‍👧‍👦 High-Risk Subgroup

**14.6%** Have family history of CVD

**BUT only 56.9% recognize family history as a risk factor!**

## 🎯 Key Implications for Public Health Practice

One-size-fits-all CVD prevention is insufficient. Interventions must be: **gender-sensitive** (targeting male knowledge gaps), **culturally tailored** (faith-based partnerships with Muslims), **timing-optimized** (prioritize first-year students), and **risk-stratified** (systematic screening for family history).



Knowledge correlates with intentions ( $r=0.23$ ,  $p<0.001$ ) but NOT risk perception ( $r=-0.02$ ,  $p=0.499$ ) → Dual-track interventions needed!