

**u<sup>b</sup>**

**UNIVERSITÄT  
BERN**

**gcb**

Graduate School  
for Cellular and  
Biomedical Sciences



**IeDE**   
International epidemiologic  
Databases to Evaluate AIDS

# Malignancies in HIV-infected adult and paediatric patients on ART



**NATIONAL HEALTH  
LABORATORY SERVICE**

National Cancer Registry

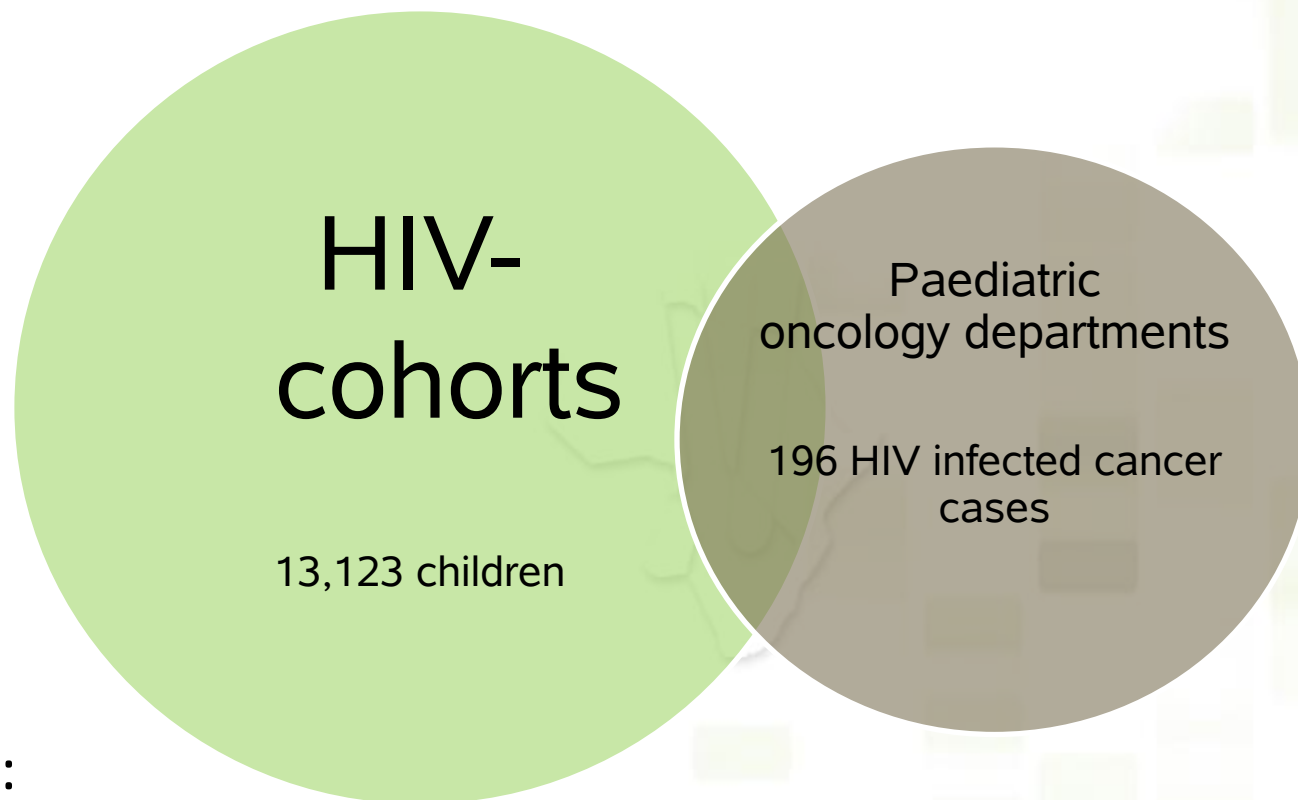
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- ❖ Paediatric Cancer Linkage Study
  - ❑ Paediatric IeDEA cohorts and Paediatric Oncology Departments
  
- ❖ Adult Cancer Linkage Study
  - ❑ Adult IeDEA cohorts and the National Cancer Registry (NCR)



HIV-cohorts

13,123 children

Paediatric oncology departments

196 HIV infected cancer cases

Identifiers:

Folder numbers, name, date of birth, gender

Identifiers:

Folder number, name, date of birth, gender





## HIV cohorts

1. Red Cross *Children's* Hospital, Cape Town
2. Tygerberg Hospital, Cape Town
3. Khayelitsha cART Programme, Cape Town
4. Harriet Shezi Clinic, Johannesburg
5. Rahima Moosa, Mother and Child Hospital, Johannesburg

## Pediatric oncology departments

- + Red Cross, Cape Town
- + Tygerberg, Cape Town
- + Baragwanath, Johannesburg
- + Charlotte Maxeke, Johannesburg



- ✘ Record linkages with HIV cohort data and cancer registry data are feasible
- ✘ Ascertainment of cancers in ART programmes is incomplete
- ✘ The incidence of cancer in HIV-infected children is high
- ✘ The risk of developing cancer increases with age
- ✘ ART reduces the risk of developing cancer



- ✘ Themba Lethu Clinic, Johannesburg compared with National Cancer Registry (NCR) cancer reports
- ✘ 14763 HIV-infected adults (aged >16 years at time of ART) enrolled 2005 -2009 vs 62418 Gauteng province cancer reports 2005 - 2011
- ✘ A total of 1251 cancers identified



- ✘ The incidence of cancer in HIV-infected adults is high
- ✘ The risk of developing cancer increases with age and decreases with increasing CD4 count
- ✘ ART reduces the risk of developing KS and NHL
- ✘ The risk of cervical cancer remains high even for patients on ART
- ✘ The risk of NADCs is higher in patients on ART



## Contributing leDEA sites, pediatric oncology departments and National Cancer Registry

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