# HIV/AIDS: WHAT CAN I DO TO FIGHT THIS PANDEMIC?

PRESENTED BY:
CAESAR OWUSU MENSAH
COMMUNICABLE DISEASE/INFECTION
CONTROL NURSE SPECIALIST
UK, JUNE 2010

## WHAT IS HIV/AIDS?

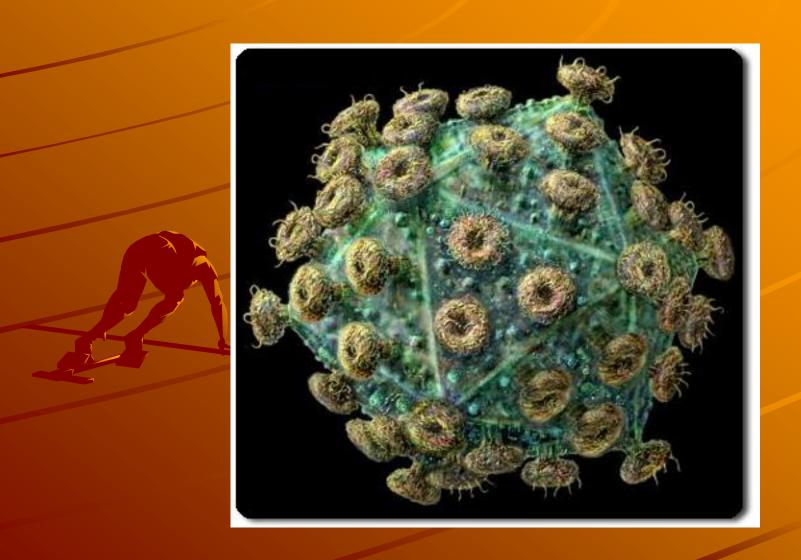
HIV is human immunodeficiency virus, the virus that infects humans and cause AIDS.

ALDS is acquired immunodeficiency syndrome, the disease caused HIV

# **Emergence of HIV**

- In 1981 Epidemiologist found a cluster of diseases associated with loss of cellular immunity in adults with no obvious reason for such presentations (homosexuals)
- In 1982, a case definition of AIDS was made after considering the underlying immunodeficiency

# The structure of the HIV virus showing outer shell - *Viral envelope*.



### The Infectious Agent

- + HIV is a retro virus and there are two types:
  - + HIV 1
  - → HIV 2
- Pathogenicity of HIV-2 is lower than HIV-1
- Disease progression is slower in HIV 2 than HIV-1
- Vertical Transmission is lower in HIV-2 than in HIV-1
- HIV-1 is the most prevalent type throughout the world
- HIV-2 has been found primarily in West Africa

#### What is HIV/AIDS?

- \* HIV/AIDS is one of the most important communicable diseases in the Ghana and in the world because it is associated with:
  - serious morbidity
  - High costs of treatment and care
  - Significant mortality
  - Considerable degree of stigma
  - Prolonged incubation period, the silent period of not being diagnosed but will be spreading

#### What is the burden of HIV/AIDS?

- ◆ People living with HIV = 39.5m
  - Adults = 37.2m
  - Women = 17.7m
  - Chn under 15yrs = 2.3m
- People newly infected with HIV = 4.3m
  - Adults = 3.8m
  - Chn under 15yrs = 530,000
- Deaths from AIDS = 2.9m
  - Adults = 2.6m
  - Chn under 15yrs = 380,000

#### How is HIV transmitted?

The virus spread through infected body fluids:

- Blood
- Semen
- Vaginal fluids
- + CSF
- Breast milk
- Infected body organs (transplants)

### How does HIV Spread?

- The infected body fluid from an infected person can be transmitted to a healthy person in one of these ways:
- Through unprotected sex
- Using or being injured by contaminated sharp instruments like needles, razor blades or other contaminated sharps
- Receiving blood transfusion, blood products or organ transplant from infected person
- Vertical transmission ie mother to child

#### Incubation Period

- The incubation period is variable, between 1-3 months depending on the person before antibody detection
- However, the time of HIV infection to AIDS diagnosis is 1-15 yrs or longer
- Disease progression from HIV to AIDS is rapid in developing countries
- Age has been a factor in disease progression: adolescents & adults who catch the infection at an early age progress to AIDS more slowly than at an older age
- Also viral type HIV-1 more rapid than type

# Who gets HIV/AIDS?

- Anybody can get HIV infection, however some are at more at risk:
  - Indiscriminate sexual practitioners
  - Drug abusers
  - Children born to HIV infected mothers
  - Contaminated Blood and blood product recipients
  - People with frequent STIs
- Note: Women and children are more at risk when it comes to sexual transmission, why?

# Signs and Symptoms

- Persistent fever
- Persistent cough
- Unexplained weight loss (10% +)
- Recurrent herpes (shingles)
- Recurrent vaginal and oral thrush
- Skin rashes
- Unexplained amenorrhoea
- Loss of appetite

### Is there a cure for HIV/AIDS?

- \*There is no cure for HIV/AIDS yet. However, there is treatment that can prevent and control the opportunistic diseases.
- \* Again, No Vaccine yet, but scientist are still working hard for a vaccine one day

## Social care & support

- \* As there is No Cure for HIV/AIDS SUPPORTIVE care remains very important in managing the infection.
- Note: HIV does not spread through ordinary social contacts like:
  - Shaking hands
  - Hugging/kissing
  - Eating from same plate
  - Travelling in same bus

#### **Prevention**

- Abstinence from sex
- Safer/protective sexual practice
- Not sharing razors and other sharps, tooth brushes
- \* Not receiving infected blood and blood products (not a big problem these days)
- Antiretroviral treatment to infected pregnant women to prevent vertical transmission

### What is the message?

 For lack of knowledge my people perish (Hosea 4:6)

Fortunately we have the information to increase our knowledge and to make informed decision which is:

STAY SAFE, PROTECT YOURSELF FOR YOU ARE SPECIAL TO OUR FAMILY & GOD.

Also show love and Support PLWA/HIV as it is not spread through social contacts.

Remember: Matt 25:36 ....When I sick, you visited me