

# HIV ACROSS TWO CONTINENTS: COMPARISON BETWEEN EGYPT AND PORTUGAL

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Dear Editor,

Human immunodeficiency virus (HIV) infection is one of the main public health concerns in Africa, Europe and the whole world. The new Millennium Development Goals (MDGs) 2015 'Getting to Zero' aim to build a world without the acquired immune deficiency syndrome (AIDS) and to put preventive strategies for HIV infection.<sup>1</sup> In this letter to the editor, I would like to compare between the epidemic of HIV in Egypt as a representative of North of Africa and in Portugal as a representative of West of Europe.

Although the considerable health improvements in Portugal in recent decades<sup>2</sup> and despite adopting many measures to improve the performance of the Portuguese healthcare system, including the reorganization of primary care and setting a long term care networks,<sup>2</sup> HIV infection continues to be of major public health importance in the country (Table 1).

In 2013, 4,369 cases of AIDS were diagnosed and reported by 29 EU/EEA countries, with a rate of 0.9 cases/100000 population. The highest rates were diagnosed and reported by Latvia (6.6) and then by Portugal (3.1).<sup>3</sup> In Portugal, as a part of West of Europe, the HIV epidemic is highly concentrated in three sub-groups: men who have sex with men, injecting drug users and migrants (specifically migrants from high HIV prevalence countries).<sup>4</sup> The prevalence of HIV among adults can reach up to 0.9%.<sup>5</sup>

On the other hand, the epidemic of HIV in Egypt is quite different. Egypt, as a country from The Middle East and North Africa (MENA) region, has one of the lowest HIV prevalence rates in the world (0.1%).<sup>6</sup> Number of HIV cases remains low in Egypt, around 7,400 [4,800-12,000].<sup>7</sup> Although a low-prevalence region, and similar to Portugal, there is evidence that the Egypt is witnessing growing epidemics among most at-risk populations (MARPs), with HIV infection more than 5% among people who inject drugs (PWID) and men who have sex with men.<sup>7,8</sup>

**TABLE 1** HEALTH STATUS INDICATORS AND DEMOGRAPHICS IN EGYPT AND PORTUGAL

COUNTRY	EGYPT	PORTUGAL
Total population (2013)	82,056,000	10,608,000
Gross national income per capita (PPP international \$, 2013)	10,850	25,360
Life expectancy at birth m/f (years, 2012)	69/74	77/84
Probability of dying between 15 and 60 years m/f (per 1 000 population, 2012)	196/120	114/49
Total expenditure on health per capita (Intl \$, 2012)	323	2,400
Total expenditure on health as % of GDP (2012)	5.0	9.5
Prevalence of HIV among adults aged 15 to 49	<0.1 (<0.1 - 0.1)	(0.5% - 0.9%)*
Antiretroviral therapy coverage among people with advanced HIV infection (%)	37 (13 - 42)	100**

DATA SOURCE: WORLD HEALTH ORGANIZATION COUNTRIES PROFILE, \*UNAIDS (PORTUGAL) AND \*\*THE ECDC THEMATIC REPORT: HIV TREATMENT, CARE AND SUPPORT

Linkages between most at-risk groups and the general population highlight the crucial need to increase the awareness and sensitize Egyptians about HIV infection to prevent further transmission.<sup>7</sup> In Egypt, about 70% of the HIV infection transmission occurs through sexual relations.<sup>7</sup> Infection through injecting drug use, blood and mother-to-child transmission are all below 5%. However, infection through renal dialysis and cases where the mode of infection is unknown each represent about 9% of detected cases.<sup>7</sup>

Unlike Portugal, the stigma of HIV is extremely exaggerated in Egypt. The burden of these attitudes is heavy in a conservative country like Egypt.<sup>9</sup> The stigma and discrimination of HIV are the most serious challenges to confront the disease in Egypt.<sup>10</sup> Many people, including the medical personnel, despise the patients because they see them as doing abnormal lifestyles.<sup>10</sup> Fear of stigma and discrimination keeps HIV positive patients from seeking counseling, treatment for AIDS, or from disclosing their HIV status.<sup>9</sup>

To conclude, it's easy to notice that the global health is still under threat due to the pandemic of HIV. There is an urgent need to establish a tailored surveillance and epidemiological methods and tools especially for high-risk groups. It's important to build new programs, reforms and policies to have an effective intervention, including the biomedical interventions such as pre-exposure prophylaxis for HIV in high-risk populations. There is an important need to give the proper feedback to the health policy makers and to translate gaps from the stage of evidence to the stage of policy and practice. Interventions to encounter stigma and discrimination, especially in Egypt, require a community dialogue that involves policy makers, healthcare personnel, public figures and people who are living with HIV.

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#### REFERENCES

1. MDG 6: combat HIV/AIDS, malaria and other diseases: The World Health Organization. Available from: [http://www.who.int/topics/millennium\\_development\\_goals/diseases/en/](http://www.who.int/topics/millennium_development_goals/diseases/en/).
  2. Barros PP, de Almeida Simões J, Allin S, Mossialos E. Health Systems in Transition. *Health*. 2007;9(5).
  3. European Centre for Disease Prevention and Control/ WHO Regional Office for Europe. HIV/AIDS surveillance in Europe 2013. Stockholm: European Centre for Disease Prevention and Control; 2014.
  4. WHO, UNICEF. Global report: UNAIDS report on the global AIDS epidemic 2013. Geneva: UNAIDS. 2013.
  5. Portugal: HIV and AIDS estimates (2012): UNAIDS. Available from: <http://www.unaids.org/en/regionscountries/countries/portugal>.
  6. Egypt: HIV and AIDS estimates (2013): UNAIDS. Available from: <http://www.unaids.org/en/regionscountries/countries/egypt>.
  7. Egypt: HIV/AIDS: UNICEF. Available from: [http://www.unicef.org/egypt/hiv\\_aids.html](http://www.unicef.org/egypt/hiv_aids.html).
  8. Mumtaz G, Hilmi N, McFarland W, Kaplan RL, Akala FA, Semini I, et al. Are HIV epidemics among men who have sex with men emerging in the Middle East and North Africa?: a systematic review and data synthesis. *PLoS medicine*. 2010;8(8):e1000444.
  9. Morrow A, ed. Combating HIV/AIDS related stigma in Egypt: situation analysis and advocacy recommendations.
  10. Egypt: HIV-positive people battle health service discrimination: IRIN; 2011. Available from: <http://www.irinnews.org/report/93624/egypt--hiv---positive---people---battle---health---service---discrimination>.
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