



BLOOD PRESSURE IN A POPULATION OF A RURAL AREA OF RWANDA: PRELIMINARY DATA

Franco Muggli, MD, Switzerland

Paolo Suter, MD, Pr, Switzerland

Gianfranco Parati, MD, Pr, Italy



Disclosure

Nothing to disclose



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background

- High Blood Pressure likely affects millions of people in Africa
- It is the most important cause of heart disease and stroke
- The burden of HT has been increasing continuously in Sub-Saharan Africa over the decades.
- But only few Sub-Saharan Africa countries have a clear hypertension management strategy



background

- the cumulative duration of untreated HT is crucial for the severity and age at manifestation of cardiovascular morbidity
- early diagnosis and effective treatment of HT may contribute crucially to the preservation of cardiovascular health in many subjects



Study for better Blood Pressure and Cardiovascular Risk Control in a rural area of the District of Nyaruguru

A model hypertension and preventive medicine consultation
at Munini Hospital and Nyamyumba Health Care Centre (Rwanda)

Franco Muggli, MD, Switzerland

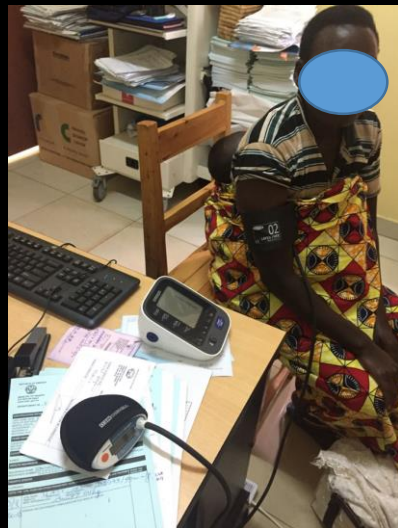
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methods

- In order to evaluate the incidence of HT, between February and July 2020, instructed health care providers measured BP at home of the inhabitants of the rural region of Nyamyumba, District of Nyaruguru (three times in a sitting position with a validated oscillometric device)





results

- A total of 7336 subjects participated to the screening:
 - median age of 32y (IQR 21,47y)
- 4053 (55%) were female, age 35y (23, 49y)
- 3283 (45%) were male, age 30y (20, 44y)) ($p < 0.001$).



results

- The mean of the last two BP measurements were $119.5 \pm 15.2 \text{ mmHg}$
- Males had a higher SBP $120.1 \pm 14.0 \text{ mmHg}$ comparing to female 118.6 ± 16.1 ($p < 0.001$.)
- Considered SBP $\geq 140 \text{ mmHg}$ for the diagnosis of hypertension 642 subjects (8.8%) had high BP values, without differences between males (8.4%) and females (9.0%); $p = 0.36$



Conclusions

Surprisingly, in a very rural peripheral region where the average age of the inhabitants is relatively low, about 9% of the subjects examined have abnormal blood pressure values.

These data confirm the need to implement also in rural areas an adequate strategy for the diagnosis and treatment of hypertension.

The next step of our project will focus the control of hypertension and associated CV risk factors with the aim of providing improved CV protection.



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