

# Access to Affordable Comfortable Footwear for **Diabetic Patients in Kumi, Uganda** University of Washington School of Medicine, IHOP-III-3 Christine Lee Harris -2008



### **Purpose**

To decrease diabetic foot ulcers by education and working with a local craftsman to manufacture affordable footwear for diabetic patients living around Kumi town.

# Background

•Diabetes is increasing exponentially in Uganda. In 1972 there were 254 patients with diabetes, now there are over a million or 4% of the Ugandan population.

•Rural Kumi is the poorest district in eastern Uganda with 82% of the population living in poverty.

·Many people in Kumi district can't afford shoes, including patients with diabetes. As a result, diabetic foot ulcers and foot amputations have become increasingly common in Kumi district.

•Comfortable sandals with inserts are available through Kumi Hospital, but cost between \$6 and \$10 US and are too expensive for most diabetic patients.



A diabetic ulcer and a diabetic patient who had his foot amputated due to walking without proper footwear

# Methods

Discussions were held with the following people to identify local needs and obtain feedback on the project:

- ·Patients and the local community
- •Kumi Hospital Orthopedic Surgeon
- Atutur Government Hospital Diabetes Focal Person
- •Other Health Workers
- District Health Office

Education about wearing shoes to prevent diabetic foot ulcers:

•Developed and printed a poster emphasizing the importance of wearing shoes and controlling blood sugar for individuals living with diabetes.

•The poster was also translated into the local language of Ateso.

#### Providing access to affordable shoes:

•Partnered with local tire shoe craftsman to develop more comfortable tire shoes with leather straps.

•Negotiated the price of tire shoe with rubber straps from \$2 to \$1 a pair.

Negotiated the price of tire shoes with leather straps from \$3 to \$2 a pair.

•Worked with the Diabetes Focal Person to arrange for tire shoe craftsman to come to the government hospital diabetes clinic and make shoes for patients.



\$2 Shoes



Tire shoe craftsman making shoes for a diabetic patients

# Results

•A total of 48 pairs of shoes were made over a 2 week period: 45 pairs with leather straps, 3 pairs with rubber straps.

•Overall patients were pleased with the shoes and expressed that \$2 was an affordable price for a pair of comfortable durable shoes.

•New patients and those who did not get shoes made may go to Kumi town and the tire shoe craftsman will make them shoes.

•The 10 posters were printed (5 in English and 5 in Ateso) and put up in: Kumi Hospital, Atutur Hospital, Kumi District Health Office, Kumi Town Health enter and Mulago Hospital.





Educational posters printed in both English and Ateso

### Discussion

·Shoes are just one facet of an approach of foot ulcer prevention that would ideally include better treatment as well as diabetes prevention.

•Ideally, the project should be evaluated to determine if it is sustainable and to see if those provided with shoes have fewer foot problems.

### References

Uganda Bureau of Statistics. (2005). Where are the Poor? Mapping Patterns of Well-Being in Uganda. Wasswa, H. (2006). Uganda struggles to cope with rise in diabetes incidence. British Medical Journal. 333, 672.

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\$1 Shoes

Durable