

Table S1: Sample size calculation

For prevalence of type 2 diabetes among tuberculosis (TB) patients

For prevalence of type 2 diabetes mellitus among TB patients sample size was calculated using the formula: $n = z^2q/r^2p$

Where $z=1.96$ (95% confidence interval)

p =prevalence of diabetes among tuberculosis patient: 25.3%¹

$q = (100-25.3) \% = 74.7\%$

r = relative error 25% of prevalence

Sample size (n) was 290

Reference 1: Baker MA, Harries AD, Jeon CY, et al. The impact of diabetes on tuberculosis treatment outcomes: A systematic review. BMC Medicine. 2011; 9.

For comparing proportion of pulmonary TB and extrapulmonary TB

For comparison among pulmonary and extra- pulmonary patients sample size calculation was done by

$$n = \{z_{1-\alpha/2}\sqrt{2p(1-p)} + z_{1-\beta}\sqrt{p_1(1-p_1) + p_2(1-p_2)}\}^2 / (p_1 - p_2)^2$$

Where,

Prevalence of diabetes in pulmonary TB patients (p_1) =27.2%²

Prevalence of diabetes in extra pulmonary TB patients (p_2) =14.8%²

$z = 1.96$ (95% confidence interval)

Power 80%

The sample size was 104 in each pulmonary and extra-pulmonary group.

Reference 2: Jeon CY, Harries AD, Baker MA, et al. Bi-directional screening for tuberculosis and diabetes: a systematic review. Tropical Medicine & International Health. 2010; 15:1300-1314.

Finally, the sample size was 175 for each pulmonary TB and extra pulmonary TB for the sub population – male /female and, hospital registered inpatient and DOTs registered. Final sample size was arrived at using adjustment for 10% nonresponse rate.