

Drug-resistant TB: An experience from Qatar

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Introduction and Background

Drug-resistant tuberculosis (DR-TB) is an important issue for public health.

Aim

This study was conducted to evaluate the characteristics, risk factors and treatment outcome of 223 DR-TB cases in the State of Qatar.

Methods

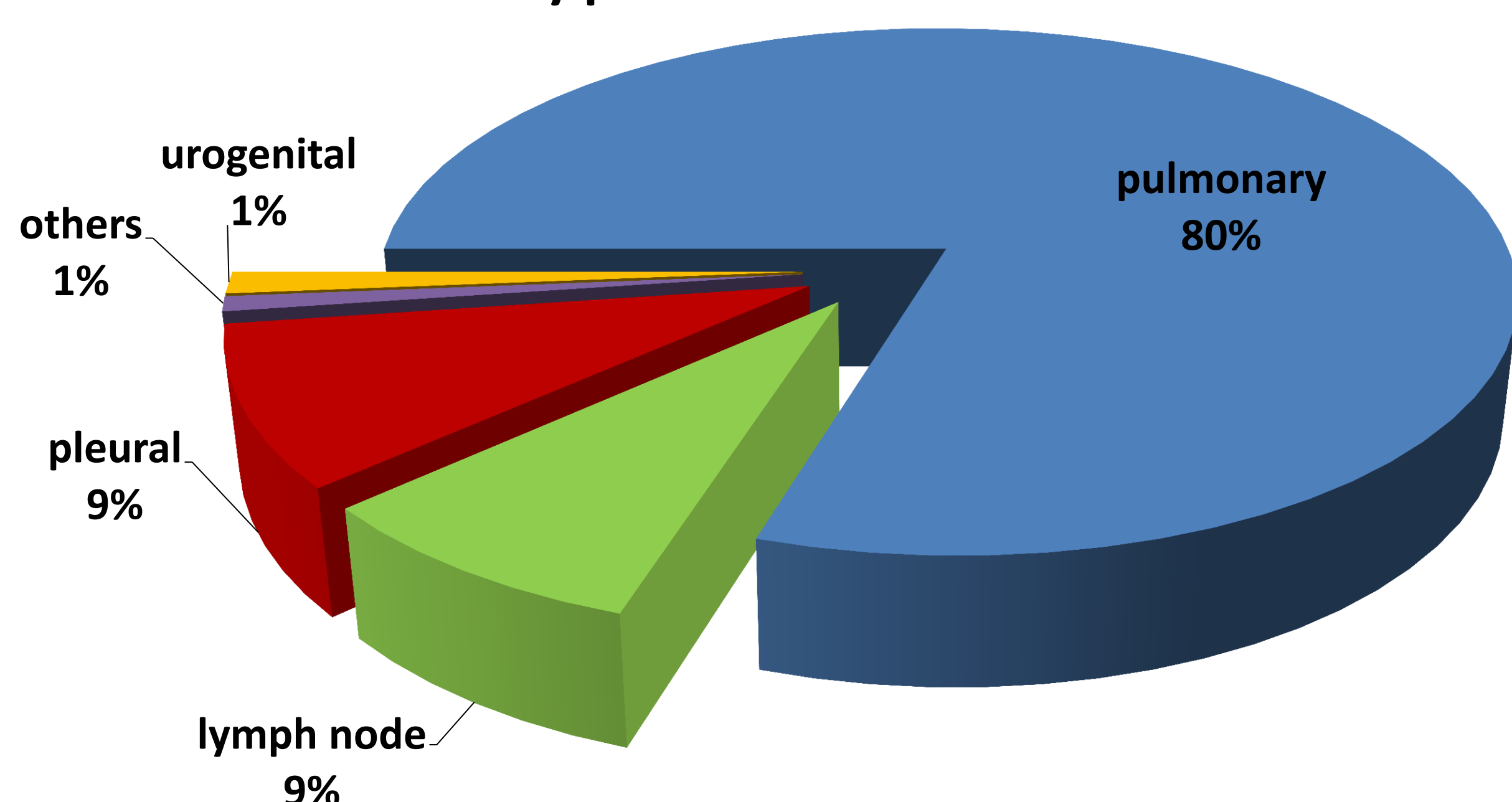
A descriptive records-based retrospective study was conducted on patients registered at Communicable Disease Centre (CDC), Qatar to all consecutive microbiologically confirmed tuberculosis cases for the period January 2010— March 2015. Demographic ,clinical data and treatment outcome was extracted .

Results

Of 3301 patients with positive M. tuberculosis culture were analyzed; 223 (6.7%) were resistant to one or more first-line drugs.

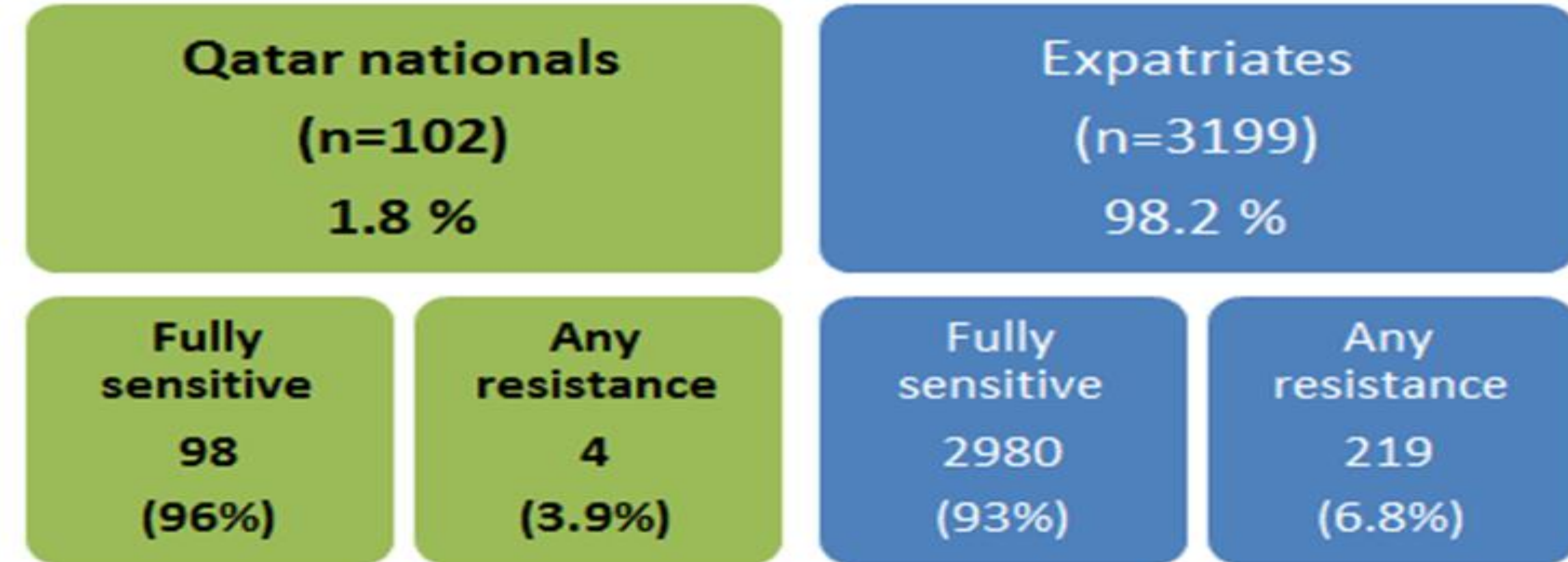
Demographic variables (223 patients)	Resistant number	(%)
Nationality		
Qatari nationals	4	(1.8)
Expatriates (including)	219	(98.2)
Arab countries	9	(4.0)
Indian subcontinent	143	(64.1)
South-East Asian	44	(19.7)
African	19	(8.5)
Other	4	(1.8)
Sex		
Male	173	(79.8)
Female	44	(20.2)
Age (years)		
0–14	6	(2.7)
15–24	49	(21.9)
25–44	135	(60.6)
45–59	30	(13.5)
60+	3	(1.3)
HIV Status		
Negative	112	(50.2)
Unknown	111	(49.8)

Types of TB Infection

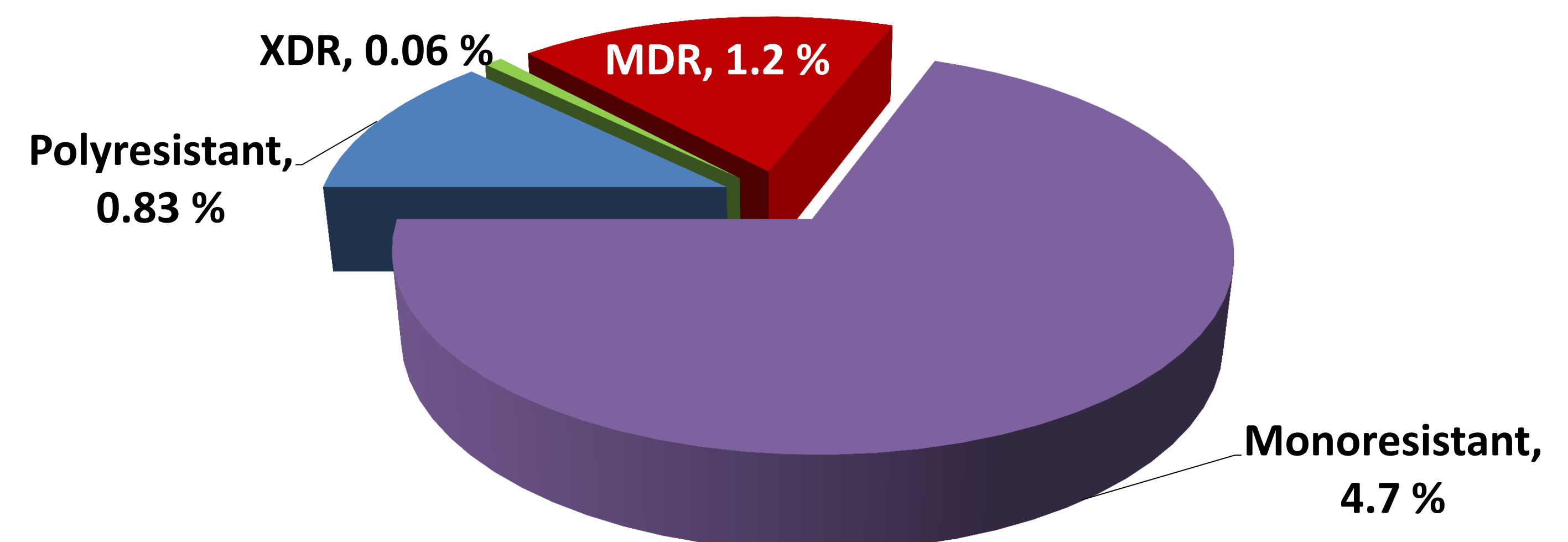


Pattern of Drug Resistance Tuberculosis in the State of Qatar from 2010 to 2015

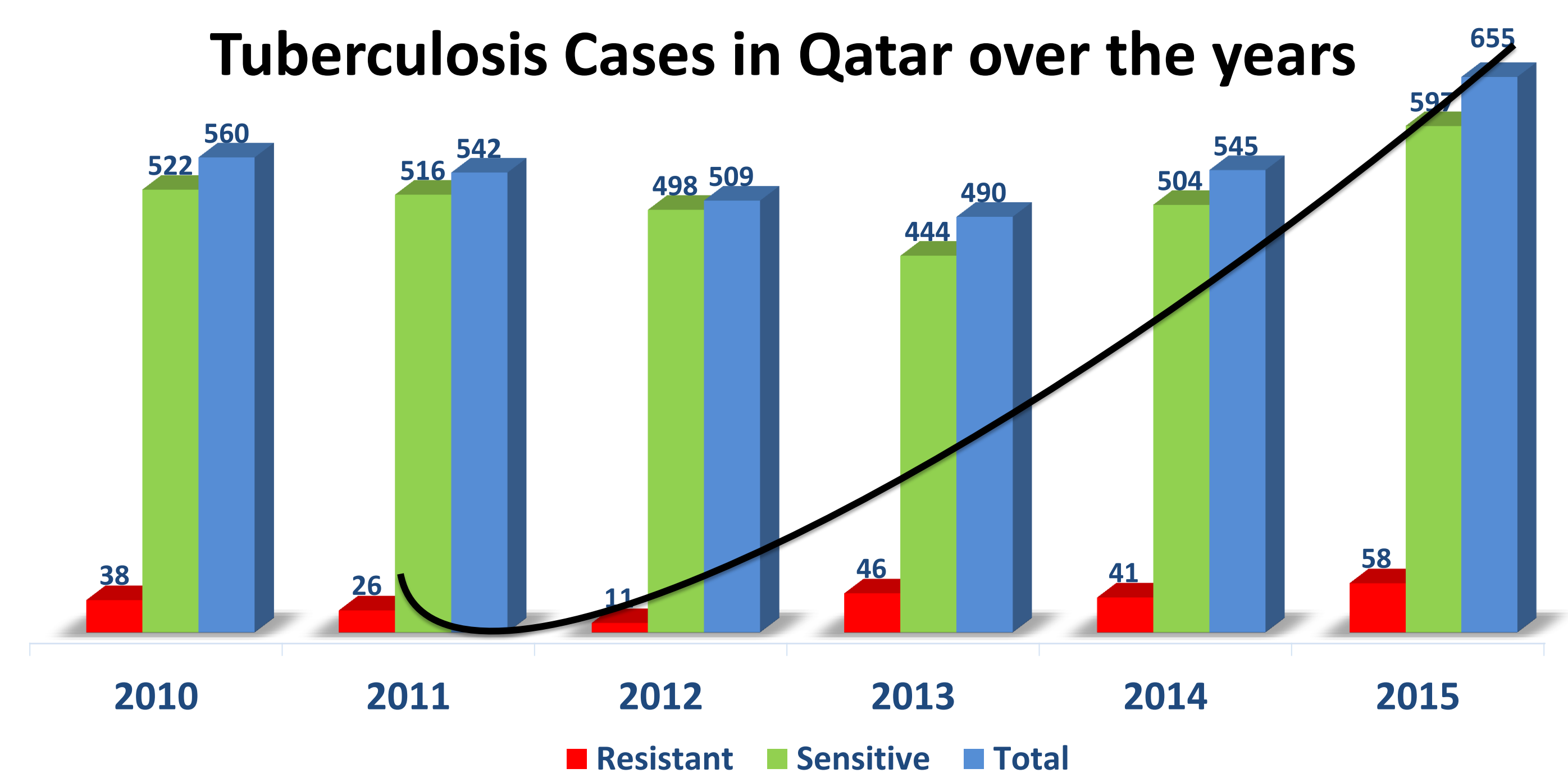
Total (n=3301)



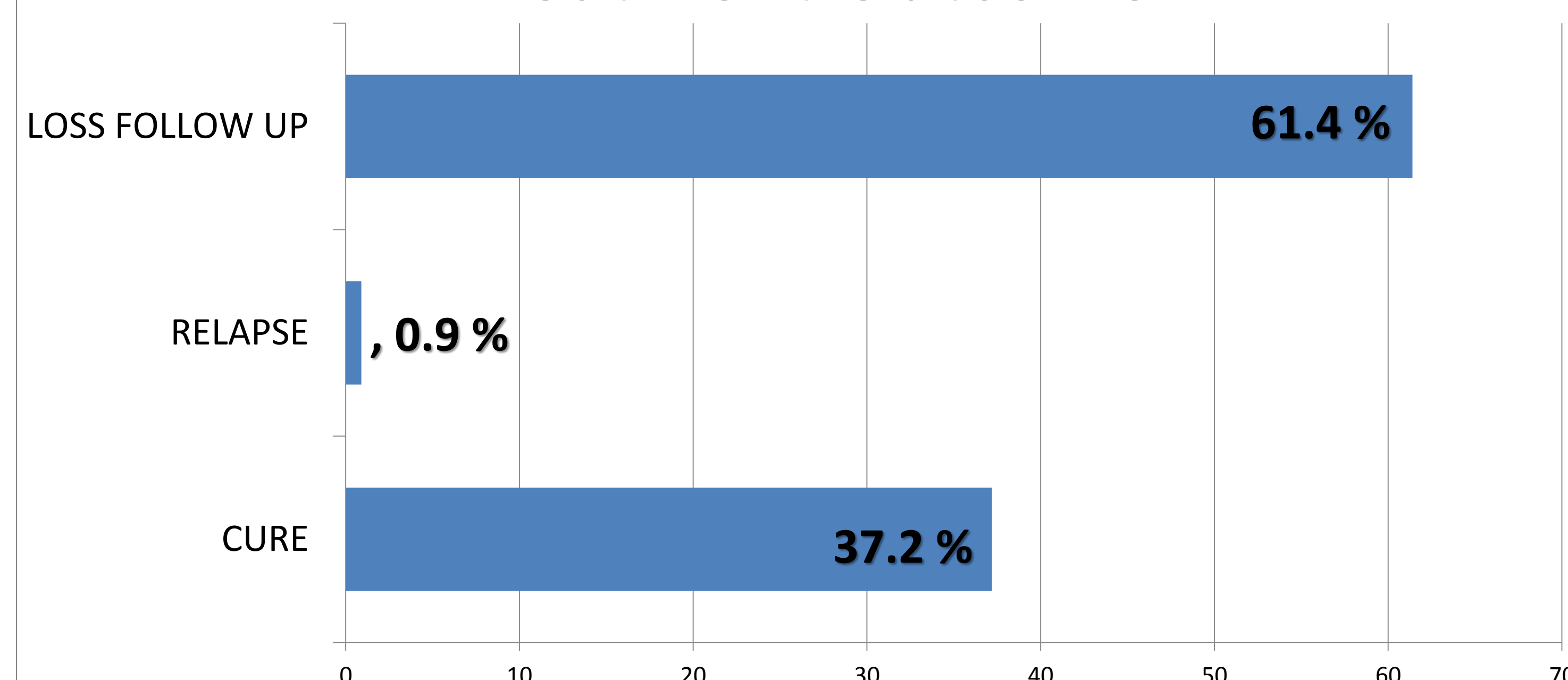
Percentage of Drug resistant TB



Tuberculosis Cases in Qatar over the years



Treatment Outcome



Conclusion

Drug-resistant TB in Qatar is influenced by migration, especially from the Indian sub contents, where the patients were probably infected. Rapid sputum sampling performed in the early stages of the disease, patient isolation and drug susceptibility testing should be the standard of care to avoid further transmission and improve TB control.

References

- 1: WHO 2015 global TB report. http://apps.who.int/iris/bitstream/10665/191102/1/9789241565059_eng.pdf?ua=1
- 2- Prevalence of drug resistance in clinical isolates of tuberculosis from GCC: a literature review from January 2002 to March 2013