

## Background

Neurocysticercosis is a Neglected Tropical Disease and an important public health issue. Our goal was to collect and analyze data regarding clinically significant gender differences among our Neurocysticercosis patients.

## Methodology

A retrospective chart search with ICD 9/ ICD 10 diagnostic code for Neurocysticercosis and neuroimaging suggestive of Neurocysticercosis was performed for clinical encounters in the hospital or affiliated clinics of Cook County Health between years 2013-2018. After a careful chart review, patients who were clinically diagnosed with Neurocysticercosis were included in the study. T-test was used to compare means of continuous variables and chi-square test to compare proportions of categorical variables.

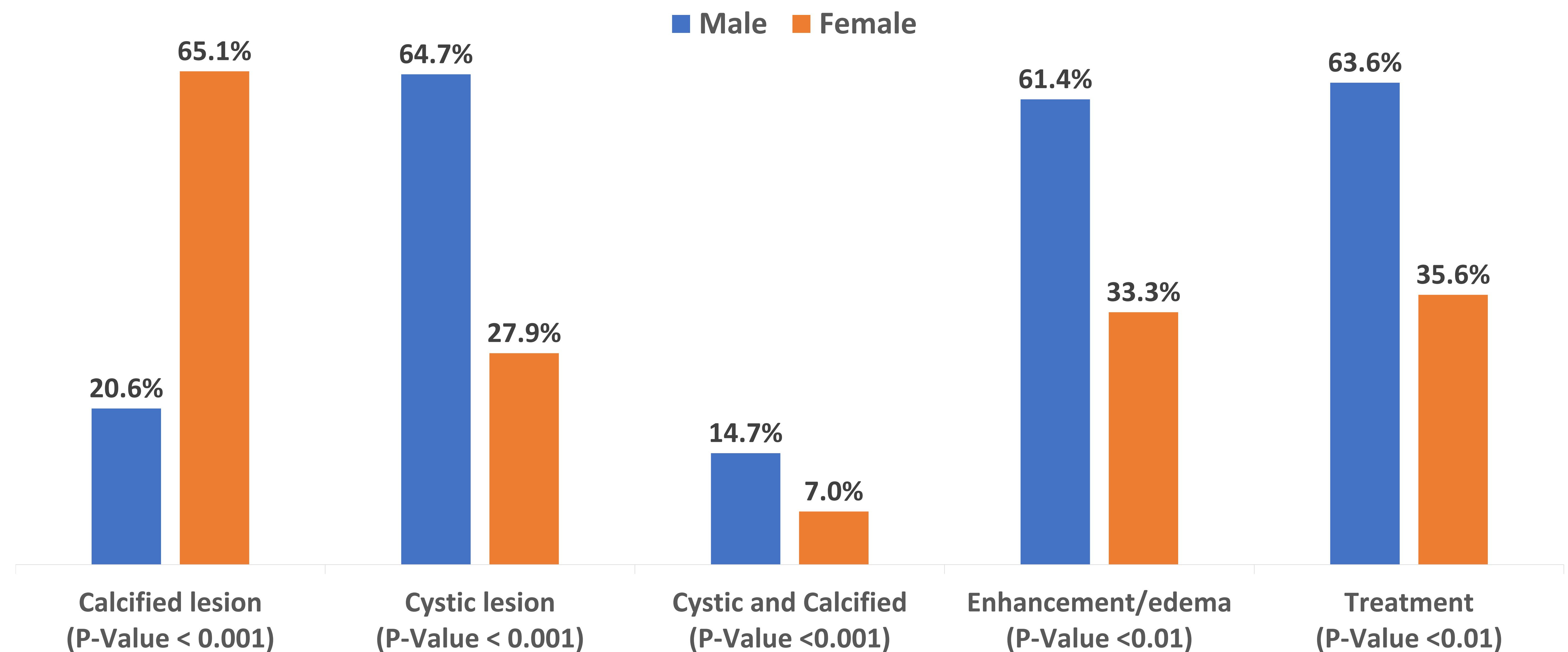
## Conclusions

Although previously reported data is limited, there is a suggestion that there are gender differences in host immune response and that inflammation surrounding parenchymal lesions is more intense in females. This study suggests that men either present early in the disease phase or have different immune responses than women and require anti-parasitic therapy more frequently. More research in this aspect is needed.

## Results

Among 90 total patients included, male (49.4%) and female (50.6%) distribution were nearly identical. The mean age in females was found to be higher than males (52.5 vs 42.0,  $P < 0.0001$ ). Almost an equal number of males and females presented with either seizures (63.6% vs 57.8%,  $P = 0.85$ ), headaches (25.0% vs 28.9%,  $p = 0.85$ ), or other symptoms (11.4% vs 13.3%,  $p = 0.85$ ). Males had more generalized seizures compared to females (60% vs 38%,  $P = 0.37$ ), although this result was not statistically significant. Females were more likely to present with  $> 1$  lesion (82.2% vs 56.8%,  $P = 0.01$ ). Males were more likely to present with cystic lesions compared to females who had more calcified lesions and were also more likely to have contrast enhancement or edema surrounding the lesions and statistically require treatment more often with Albendazole/Praziquantel.

## Neuroimaging Characteristics and Treatment



## References

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