

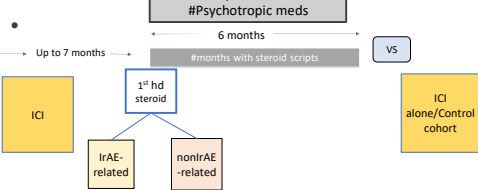
# Neuropsychiatric events during early immune checkpoint inhibitor treatment are more frequent with extended steroid exposure.

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## Introduction

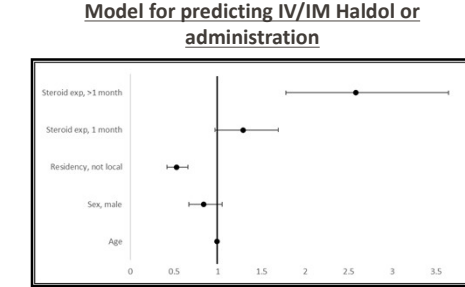
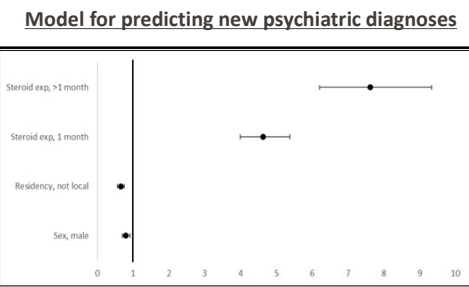
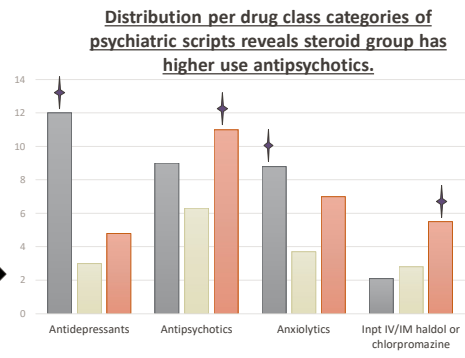
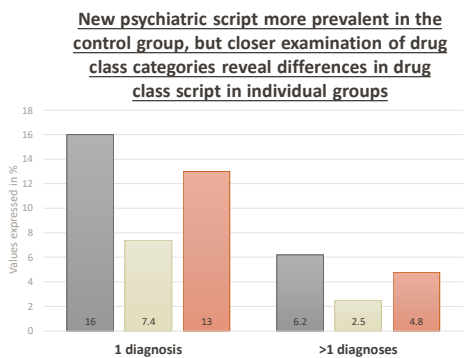
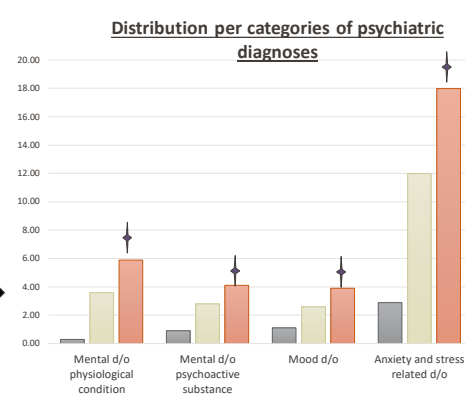
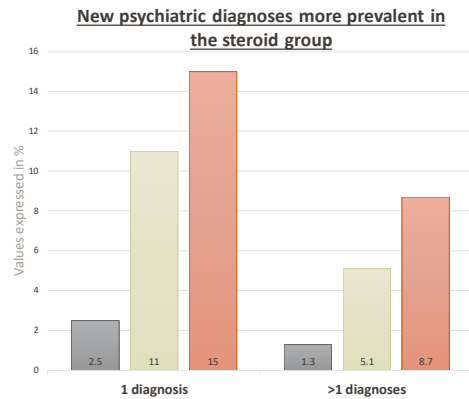
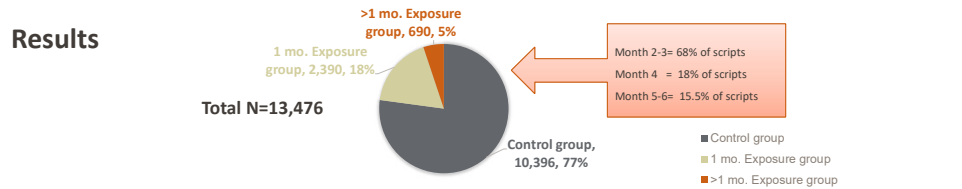
- Immune check point inhibitor (ICI) have revolutionized cancer treatment, response is not tumor specific.
- Immune related adverse events (IrAe's) are treated with high dose steroids specifically glucocorticoids (hd GC) for 4-6 weeks.
- Neuropsychiatric (NPS) effects of hd GC not studied in oncological population specifically those who had ICI.
- Aim: To characterize NPS events by proxy measures i.e., new psychiatric diagnoses and new psychiatric medications in early ICI treatment.

## Methods



- Patients identified by EMR.
- From 6/1/2017 to 6/1/2022.
- Steroid cohort (prescribed  $\geq$  40mg/d equivalent of prednisone) and control cohort (no steroid scripts or administration).
- Steroid cohort further divided into 1-month and > 1-month exposure based on number of months steroid script was given.

## Results



## Results continued

Steroid group was 22.8% of the sample

### For new psychiatric diagnoses

Exposure	Odds Ratio	95% Confidence interval
1-month steroid exposure	4.63**	3.99,5.38
>1-month steroid exposure	7.62**	6.20,9.33

\*\*=statistically significant difference

### For new psychiatric scripts

Exposure	Odds Ratio	95% Confidence interval
1-month steroid exposure	1.29	0.97,1.69
>1-month steroid exposure	2.58**	1.78,3.64

\*\*=statistically significant difference

## Future Directions

Longitudinal evaluation.  
Look for additional predictors of NPS in this population.

## Clinically

Encourage oncologist to review prior psychiatric history with patient.  
Ensure patient has appropriate referral while undergoing ICI treatment.

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