**USC** School of Pharmacy

# Development and Implementation of Depression Management at Keck's Rheumatoid Arthritis Clinic

Tu Vuong, PharmD 2018 Candidate, Hao Dieu, PharmD 2018 Candidate, Michelle Chu, PharmD, CDE, BCACP University of Southern California, School of Pharmacy

#### BACKGROUND

- Up to 66% Rheumatoid Arthritis (RA) patients are affected by depression <sup>1,3,4</sup>.
- Approximately 17% of RA patients are diagnosed with major depression disorder <sup>1</sup>.
- It has been reported that rheumatologists rarely discuss the topic of depression with their patients during office visits <sup>5</sup>.
- At Keck clinic, chart-review showed that among 167 patients, 17% of RA patients are co-diagnosed with depression. (Figure 1)
- According to previous data, Keck clinic has not had proper intervention for patients with positive PHQ-9<sup>2</sup>. (Figure 2)

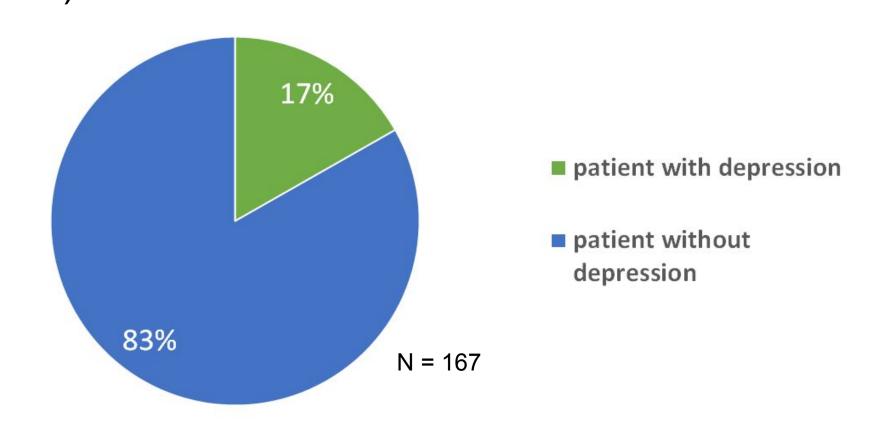


Figure 1: RA patients with depression at Keck clinic

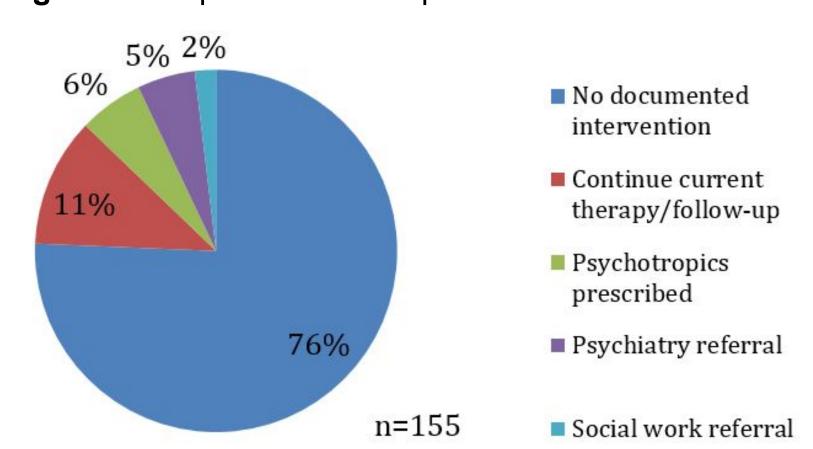


Figure 2: Keck's interventions for patients with positive PHQ-9 score

### **OBJECTIVES**

#### Purpose

Incorporate clinical pharmacy into an interdisciplinary depression management program at Keck Rheumatoid Arthritic clinic



Primary Objective



Secondary Objective

Assess the qualitative outcomes of the program through PHQ-9 improvement and medication adherence

Evaluate patient's perception and satisfaction of the pharmacist-led depression management program

#### METHODS



### Assess the qualitative outcomes of the pharmacy service:

- PHQ9 improvement
- Medication adherence via MMAS-8





Perception Survey (Pre-implementation)Assess patient's perception of pharmacist managing depression



Satisfaction Survey (Post-implementation)

Assess patient's satisfaction of pharmacy depression management service

#### Demographic questions asked in both surveys

Age, Gender, Race (Hispanic/Latino, Asian, Non-hispanic white, African American, Native American or Alaska Native), and the highest level of education.

Perception Survey					
Pharmacy service is helpful for my depression care.					
Strongly agree	Agree	Disagree	Strongly disagree		
I prefer for my depression to be managed ONLY by physician.					
Strongly agree	Agree	Disagree	Strongly disagree		
I prefer my depression to be managed by other healthcare providers (psychologist, pharmacist, occupational therapist, social worker) in addition to physician.					
Strongly agree	Agree	Disagree	Strongly disagree		
Using any number from 0 to 10, where 0 being the least preferred and 10 being the most preferred, how comfortable are you to have your depression managed by Keck clinical pharmacists?					
0 1	2 3 4	5 6 7	8 9 10		

Satisfaction Survey					
How often did you feel that the time you spent with the clinical pharmacist was appropriate?					
Never	Sometimes	Usually	Always		
How often did pharmacy staff (pharmacist, pharmacy students, nurse) treated you with courtesy and respect?					
Never	Sometimes	Usually	Always		
After seeing the clinical pharmacist, I understand my medications better.					
Strongly agree	Agree	Disagree	Strongly disagree		
Pharmacy service is helpful for my depression care.					
Strongly agree	Agree	Disagree	Strongly disagree		

Funded by the College of Psychiatric and Neurologic Pharmacists Foundation (CPNPF) Defining the Future Grant

## METHODS (cont.)

#### Inclusion/Exclusion Criteria:

#### **Inclusion criteria**

- ≥ 18 years old From Keck Medical Center of
- **USC Rheumatoid Arthritis**
- **English-speaking**
- Diagnosed with depression (with or without anxiety)
- Referred to pharmacy clinic by physicians or behavioral health specialists
- < 18 years old</li>
- Refusal to participate in the study

**Exclusion criteria** 

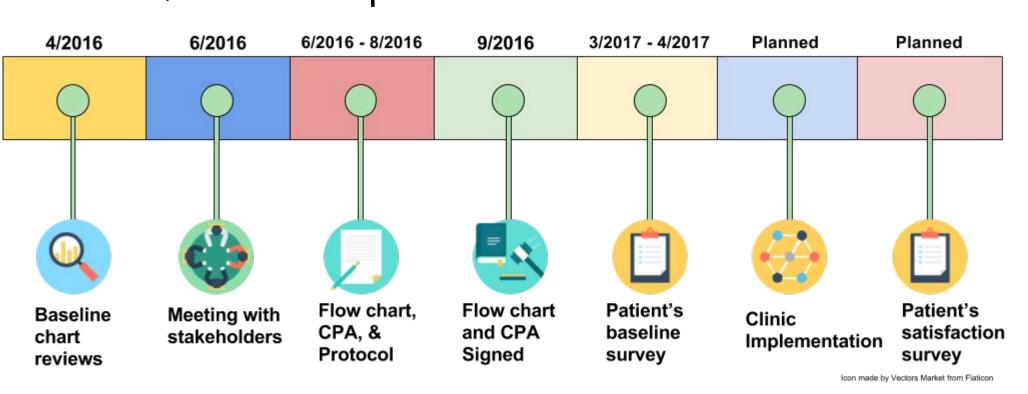
- Non-English speaking
- Diagnosed with or history of bipolar disorder, substance abuse, psychosis symptoms and personality disorders

#### RESULTS

Research and data collection are currently in progress, therefore no results are currently available

## **FUTURE PLANS**

- Administer patient's perception and satisfaction survey
- Pilot depression management services at RA clinic
- Collect outcome data: adherence improvement and PHQ-9 score improvement.



## DISCLOSURE

The authors have no conflict of interest to disclose

#### REFERENCES

- 1. Fiest KM, Hitchon CA, Bernstein CN, et. al. (2017). Systematic Review and Meta-analysis of Interventions for Depression and Anxiety in Persons With Rheumatoid Arthritis, Journal of Clinical Rheumatology; 00:1-13. 2. Brittany Hill, PharmD. An Evaluation of Provider Response to Positive Depression Screening in a Primary Care Setting. Los Angeles, CA: USC Keck Medical Center; 2016
- Matcham F, Rayner L, Steer S, Hotopf M (2014). The prevalence of depression in rheumatoid arthritis: a systematic review and meta-analysis. Rheumatology (Oxford); 53(3):578-9.
- 4. Lok EY, Mok CC, Cheng CW, et al.(2010). Prevalence and determinants of psychiatric disorders in patients with rheumatoid arthritis. Psychosomatics; 51:338–338e338 Sleath, B., Chewning, B., de Vellis, B. M., et al. (2008). Communication about depression during rheumatoid arthritis
- patient visits. Arthritis & Rheumatism; 59:186–191. Isik A, Koca SS, Ozturk A, et al. (2007). Anxiety and depression in patients with rheumatoid arthritis. Clinical
- Rheumatology; 26:872–878. Icon designed by Vectors Market, Flat Icons, Roundicons from Flaticon