



Congestive Heart Failure Patient Education

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Conflicts of Interest

- ▶ I have no conflicts of interest, financial or otherwise, to disclose.
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Project Aim

- ▶ The purpose of this MSA project was to provide patients with education specifically related to congestive heart failure (CHF)
- ▶ This project specifically provided information on:
 - ▶ Normal heart physiology
 - ▶ Pathophysiology of CHF
 - ▶ CHF risk factors
 - ▶ Therapies (medications and lifestyle modifications)
 - ▶ Red Flags for patients living with CHF
- ▶ A secondary aim was to increase patient participation in “shared decision – making” practices by way of increasing their health literacy



Background



- ▶ CHF continues to rise in the US and its prevalence is 40% higher in rural areas compared to urban metropolitan settings (1). This means the majority of patients with CHF live in areas with limited access to healthcare
- ▶ A study by Chin et al. showed that only 23.5% of CHF patients are taking the correct medication at the correct dose as prescribed by their physician. This study attributed this lack of compliance to a lack of understanding by the patients (2)
- ▶ A study by Flemming and Kociol looked at readmission rates in CHF patients and found that after implementing scheduled patient education sessions, readmission rates within one year were reduced by 95% (3)



Background cont.

- ▶ Educating patients seems to have the same outcome improvements regardless of the patient's baseline literacy level. Patients with a literacy level below high school that received self-care education have been shown to have fewer hospitalizations and deaths when compared to individuals that did not have this disease specific education (4)
- ▶ It has been demonstrated that patients with lower literacy levels express the same desire to participate in their healthcare plans yet actual participation is much lower compared to patients with higher literacy levels (5)



Methodology



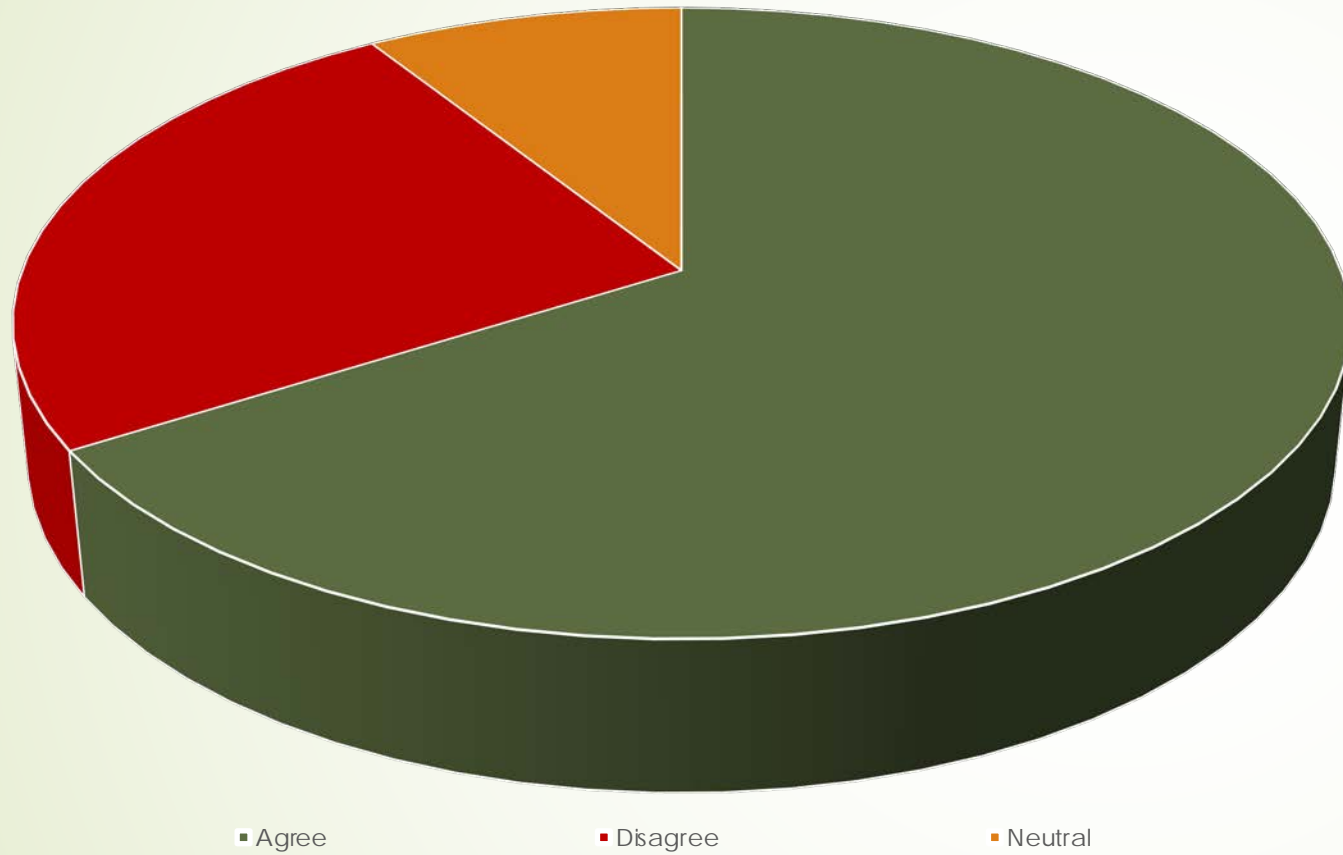
- ▶ The target population was those enrolled in cardiac rehabilitation at Platte Valley medical center from March, 2020 to January, 2022.
- ▶ Initial project design included monthly lectures hosted by myself. The start of the COVID 19 pandemic forced a more indirect approach
- ▶ A brochure was developed and distributed to all new patients during their cardiac rehab orientation
- ▶ Each patient also received a survey consisting of 6 statements that they were asked to agree with, disagree with, or remain neutral to
- ▶ Patients took both the brochures and surveys home with them, returning the surveys at their next appointment



Methodology cont.

- ▶ Patients were not selected for having CHF; however, all patients had one or more risk factors for the development of CHF
- ▶ The brochure outlined normal cardiac physiology, the pathophysiology of CHF, risk factors for CHF, common therapies (medications, and lifestyle modifications), red flags
- ▶ The sums of the answers to each question were recorded and percentages then derived

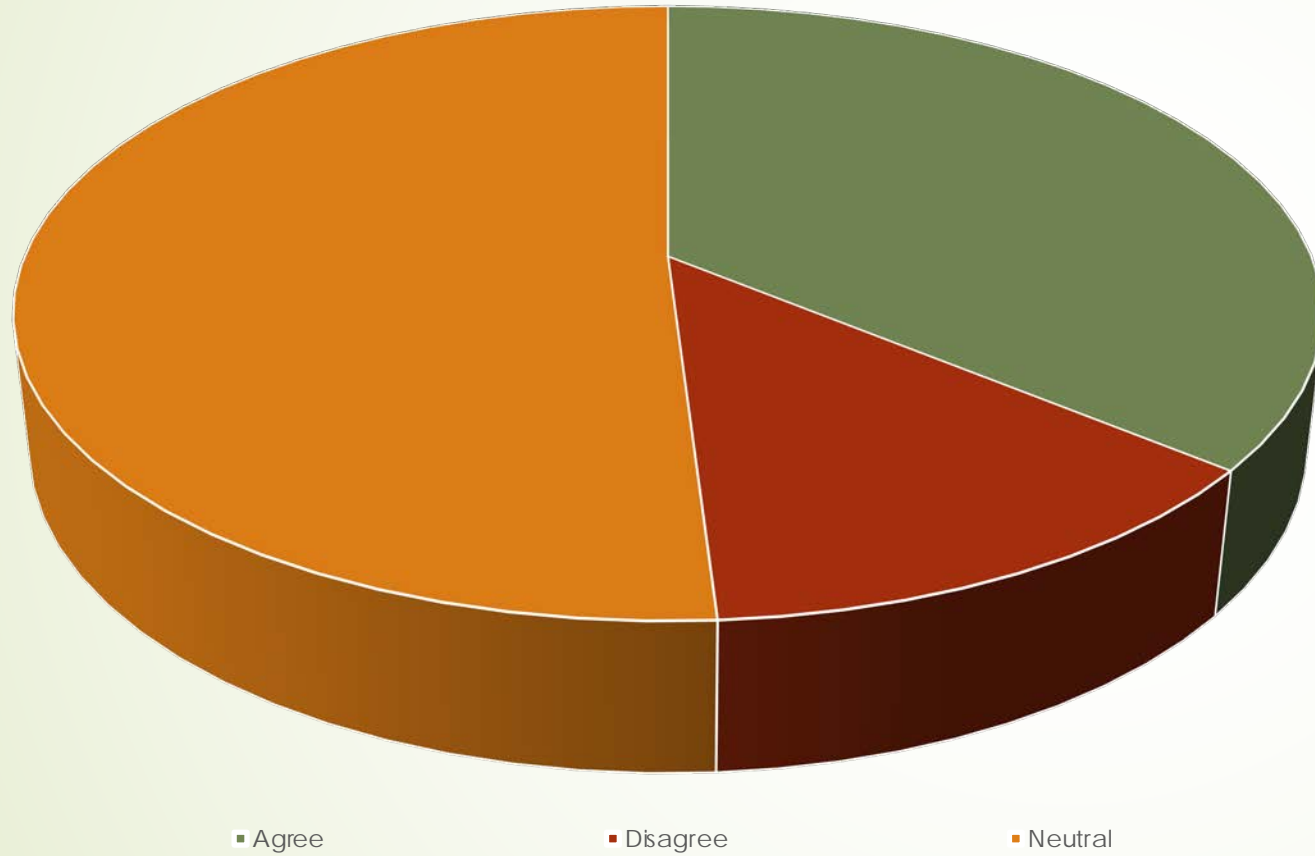
Statement 1



Results

"Prior to this brochure, I knew what heart failure was."

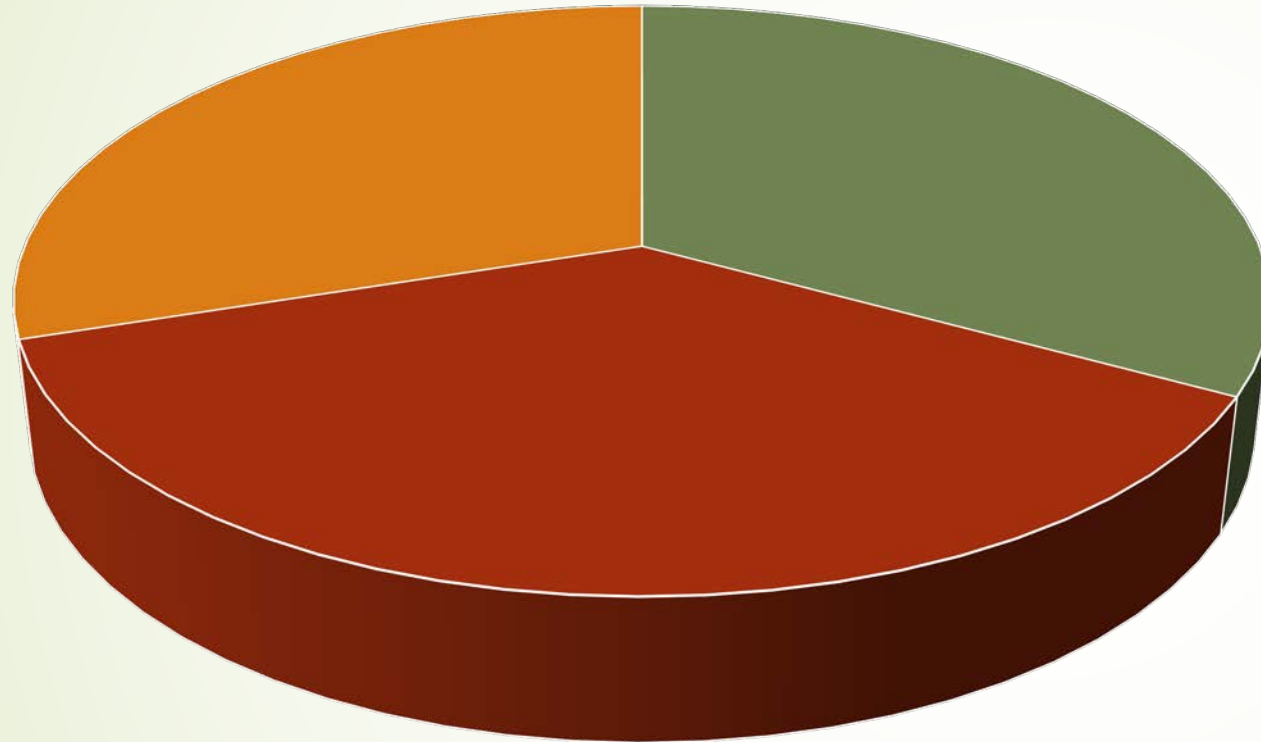
Statement 2



Results

"Reading this brochure changed the way I defined heart failure."

Statement 3



■ Agree

■ Disagree

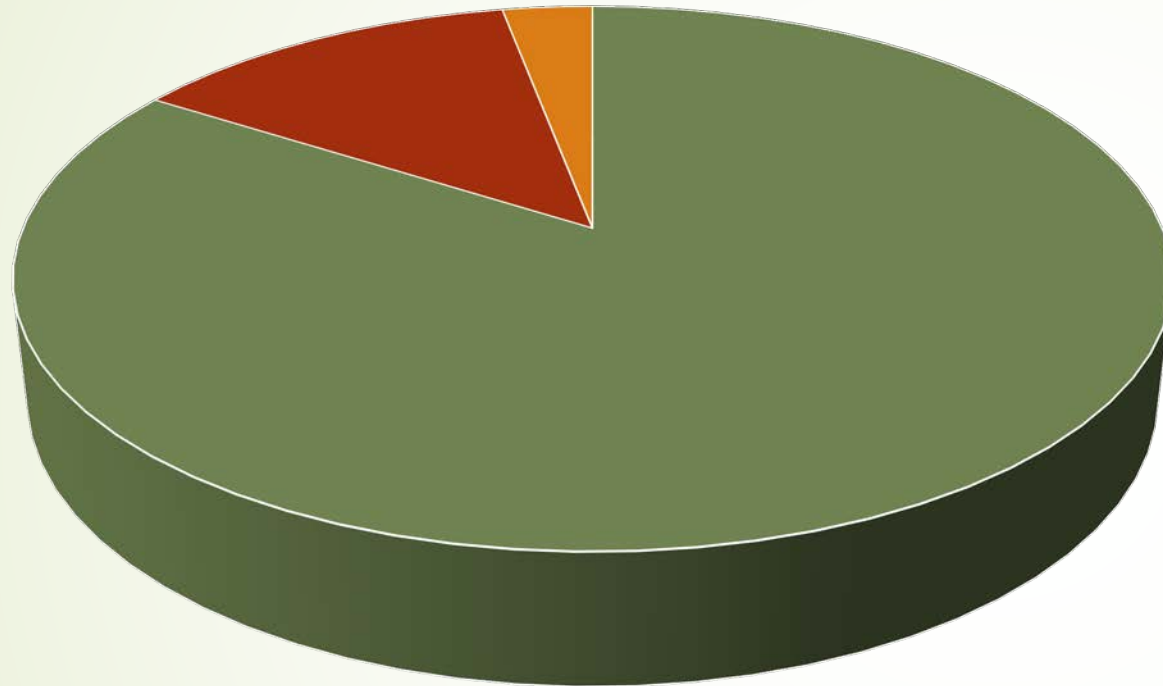
■ Neutral



Results

"I have difficulty understanding some of the things my Dr. says when they explain my condition".

Statement 4



■ Agree

■ Disagree

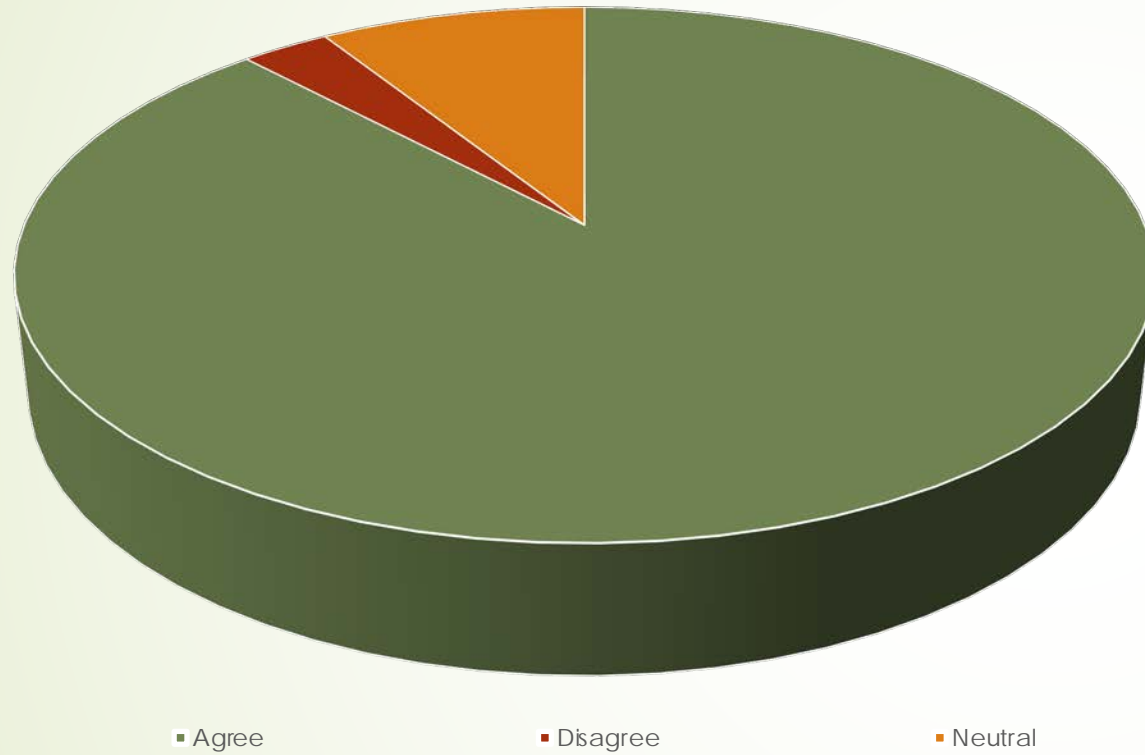
■ Neutral



Results

"I now feel more confident asking my doctor questions about my medical condition".

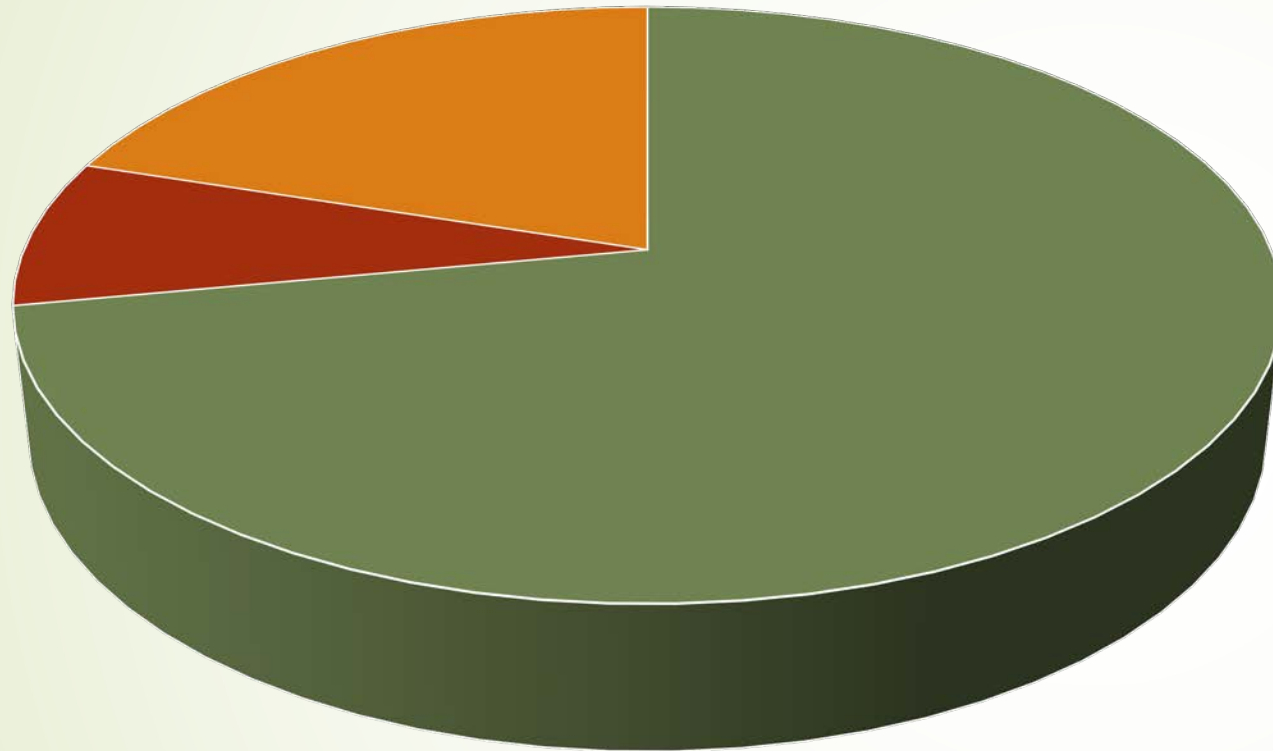
Statement 5



Results

“Brochures are helpful for understanding medical information”.

Statement 6



■ Agree

■ Disagree

■ Neutral



Results

"I have a better understanding of the medications I am currently taking".



Discussion



- ▶ There is clearly an established need for patients to be educated on their diseases, especially those with chronic conditions
- ▶ This project set out to fill that void in a small population undergoing cardiac rehabilitation at Platte Valley Medical Center
- ▶ This data is anecdotal at best; however, it does suggest that these patients did learn valuable information. Some even realizing their background knowledge may have been inaccurate
- ▶ The vast majority of patients agreed that brochures were an effective medium for the delivery of medical information
- ▶ There is a strong suggestion that patients felt more confident taking an active role in their health management plans after the brochures. 88% of the patients reported increased confidence asking their physicians questions.



Discussion cont.

- ▶ Ultimately the goal of educating patients on CHF and secondarily improving their confidence to engage in shared decision making was achieved
- ▶ Limitations for this project included:
 - ▶ A small patient population not selected for having CHF
 - ▶ Logistic limitations brought on by the COVID 19 pandemic
 - ▶ Ideally the educational sessions would have been held in person with the opportunity to ask questions in real time



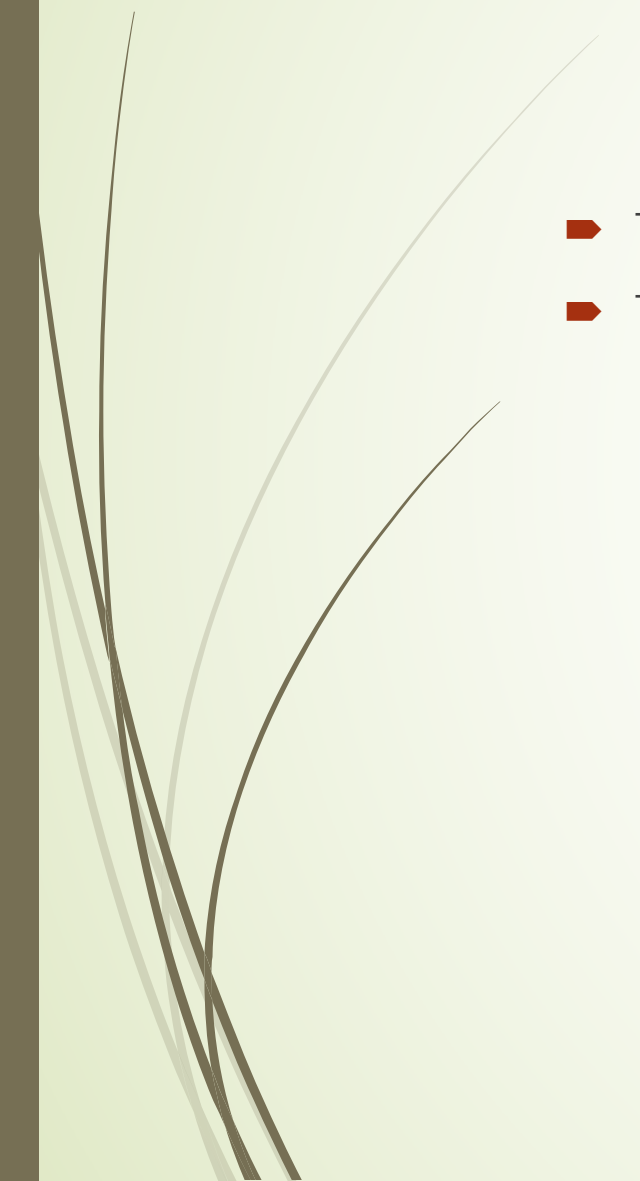
Future Directions



- ▶ Having created informational brochures, patients enrolling in cardiac rehab at Platte Valley medical center can continue to receive this information even after the conclusion of this project
- ▶ There is potential to implement this type of educational strategy on a larger scale for other chronic conditions including diabetes, chronic obstructive pulmonary disease, and chronic kidney disease



Acknowledgements

- ▶ Thank You Dr. Kelsey Flint (Faculty Mentor)
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References

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