

DEVELOPING AN EATING DISORDERS PARTIAL HOSPITALIZATION PROGRAM FOR CHILDREN AGES 8-12: USING WHAT WE ALREADY KNOW

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INTRODUCTION

Anorexia nervosa is the deadliest mental illness with mortality rates far surpassing major depressive disorder, bipolar disorder and schizophrenia (Arcelus, Mitchell, Wales, & Nielsen, 2011). Appropriate and timely diagnosis of anorexia nervosa is crucial to reducing the rate of morbidity (Harrington, Jimerson, Haxton, & Jimerson, 2015) including but not limited to skeletal effects (Donaldson & Gordon, 2015), central nervous system effects (Hasan & Hasan, 2011), and disruption of pubertal development (Klump, 2013). In more recent years, the number of younger children, ages 8-12, presenting with anorexia nervosa has increased significantly (Gonzalez, Kohn, & Clarke, 2007). Changes to the Diagnostic and Statistical Manual of Mental Disorders, Fifth Edition (DSM-V) have allowed for increased accurate diagnosis of anorexia nervosa in children. Specifically, the criteria for Anorexia Nervosa, Restricting Type no longer includes amenorrhea, which allows for more accurate diagnosis in pre-pubertal children as well as males. In addition, the diagnostic criteria are no longer limited to a specific threshold for underweight status but accounts for a failure to make expected weight gain to maintain a normal developmental trajectory (American Psychiatric Association, 2013).

As the diagnostic criteria for Anorexia Nervosa became more inclusive, the need for age-appropriate and effective treatment emerged. In response to this need, the Pediatric Eating Disorders Center at Atlantic Health System (PEDCAHS) opened distinct programming for children ages 8-12 in the fall of 2015. Previous research has documented the efficacy of Family Based Treatment (FBT), which is a modality that places the parents in charge of re-nourishing their ill child. Programmatic research examining the outcomes of using FBT within an adolescent Partial Hospitalization Program (Feehan, Paseka, & Gazzola, 2017) has equally shown the success of incorporating FBT in a higher level of care setting. Therefore, the purpose of the present study is to assess if such outcomes can be replicated in an FBT-based partial hospitalization program for children.

METHODOLOGY

Data was collected at PEDCAHS over a three-year timeframe as 61 participants, ages 8-12, transitioned through child programming across multiple levels of care. All participants received continuous FBT in each level of care. Upon intake, participants completed a battery of self-report psychological measures, and medical symptoms were evaluated through clinical exam, current weight and vital sign measurements, historic weight and growth patterns, and laboratory values. To assess psychological outcomes, participants completed the same battery of self-report measures at discharge from PHP, discharge from IOP, six month follow up during outpatient FBT, and successful discharge from FBT. Medical symptoms were reevaluated throughout treatment.

The following medical complications are monitored for improvement through clinical exam, weight and vital sign measurements, and collection of laboratory values upon PHP intake. These variables are reassessed at discharge from PHP, discharge from IOP, six month follow up during outpatient FBT, and successful discharge from FBT.

- Expected Body Weight (EBW)
- Bradycardia
- Orthostasis

Participants completed a battery of self-report, psychological measures at PHP intake, discharge from PHP, discharge from IOP, six month follow up during outpatient FBT, and successful discharge from FBT. A Paired Two Sample for Means t-Test was conducted to determine the improvement of scores on the following measures at the various levels of care.

- The Children's Depression Inventory 2 (CDI 2)
- Screen for Child Anxiety Related Disorders (SCARED)

RESULTS

Results indicate an overall improvement in both psychological and medical functioning when the FBT modality was integrated into a higher level of care with children. Statistically significant improvements occurred in psychological functioning across all the administered psychological measures through the completion of PHP and at successful discharge from FBT. Outcomes further indicate a reversal in medical complications, including orthostasis at discharge IOP and bradycardia at 6 months. Participants also made significant weight gain progress with almost complete weight restoration at discharge from IOP.

DISCUSSIONS & CONCLUSIONS

The present study found that when children participate in a higher level of care using the FBT modality, significant improvements in psychological and medical functioning occurred at the completion of PHP through discharge from FBT. These results are similar to the findings seen in outpatient FBT outcome studies and the findings of adolescent patients at PEDCAHS. This suggests that responses seen with FBT in an outpatient setting can be replicated in a higher level of care setting with children, which widens the scope of patients who can be treated with this modality. Limitations of the study include a small sample size, a lack of long-term follow up, and the absence of a control group.

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The authors of this study declare there are no conflicts of interest.

AVERAGE LENGTH OF STAY

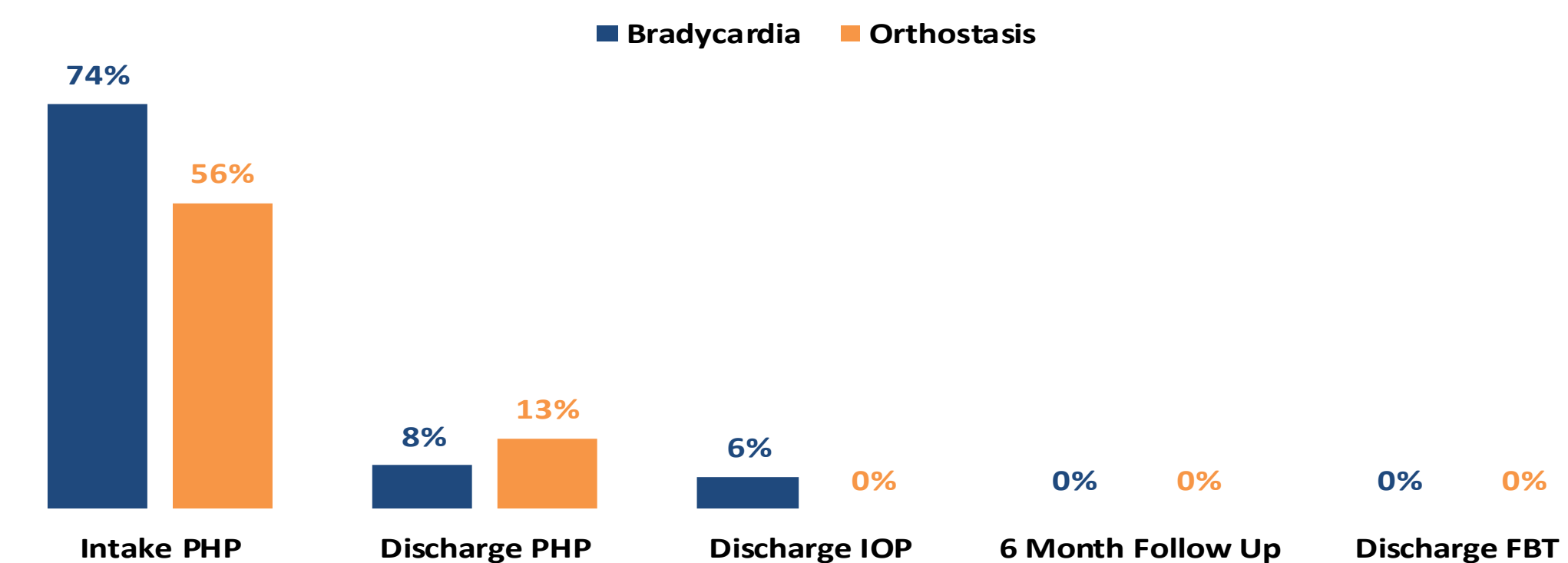
Average Length of Stay PHP to IOP 4.5 weeks
Average Length of Stay PHP to FBT 2.5 weeks

SIGNIFICANT IMPROVEMENT ON SELF REPORT MEASURES

There was a significant improvement in scores across all measures and levels of care

Psychological Measure	Intake PHP → Discharge PHP	Intake PHP → Discharge IOP	Intake PHP → 6 Month Follow Up	Intake PHP → Discharge FBT
CDI	p = .0003 MD = -6.58 SDD = -3.78	p = .0003 MD = -9.93 SDD = -3.64	p = .087 MD = -10.8 SDD = -4.88	p = .009 MD = -10.92 SDD = -9.45
SCARED	p = .0003 MD = -6.58 SDD = -3.78	p = .023 MD = -6.62 SDD = -4.12	p = .26 MD = -7.67 SDD = -.18	p = .007 MD = -6.86 SDD = -1.51

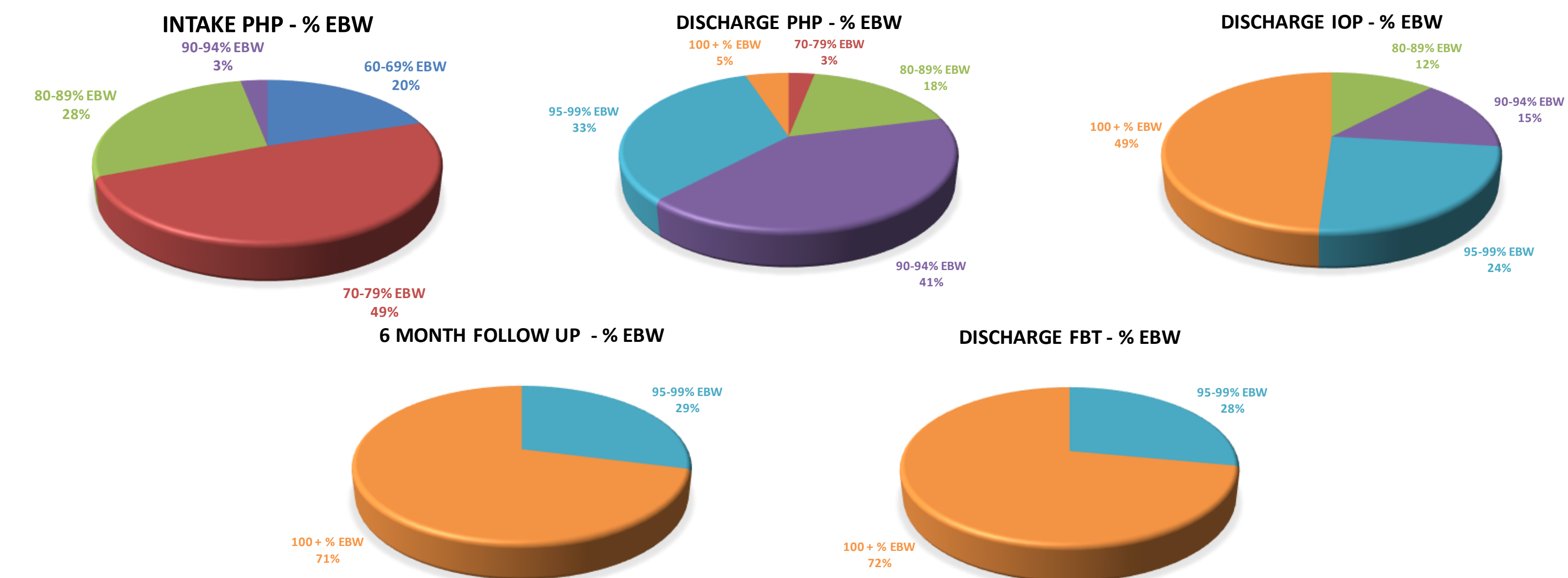
IMPROVEMENT OF MEDICAL COMPLICATIONS



WEIGHT IMPROVEMENT

Patients gained an average of 2.9 pounds per week when on weight gain protocol

PERCENT EXPECTED BODY WEIGHT (% EBW)



Improvements in weight are calculated using participant's Current Weight ÷ Expected Body Weight = Percent Expected Body Weight (% EBW).
Expected body weight is determined by the participant's medical physician and is individually based on patient's own historic weight and growth patterns