Implementing a Transitional Care Protocol to Reduce Readmission Rates among Patients with Substance Use Disorders in a Managed Care Organization.

List of people who were involved in the study
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BACKGROUND

The number of SUD patients repeatedly being admitted back into treatment is a great concern that needs active intervention to help River Oak Treatment Center bring down the costs of re-admittance and meet the national guidelines for caring for SUD patients.
This facility has experienced significantly high readmission rates in the past 5 years, most of the incidences being attributed to poor coordination of care when transitioning from hospital to home care.

PURPOSE AND HYPOTHESIS

This study's purpose is to find out the effect of an enhanced TOC protocol on the SUD patient readmission statistics.
The main objectives include to create a detailed TOC guideline, educate the providers, evaluate their knowledge and their attitudes, ensure their adherence to the guideline, and research the guidelines' effectiveness in reducing readmission risks.
The study's hypothesis is that implementing a transitional care protocol using the AHRQ Guide by engaging family, case managers, and care coordinator will reduce readmission risks for SUD patients in an inpatient setting.

METHODS

Intervention: The plan included the double-checking of the IDEAL discharge checklist as part of the coordination efforts in planning discharge, medication reconciliation, patient education, and follow up care after discharge.
Framework: Afaf Meleis' transition theory and the PDSA framework for QI project implementation, guided the development and implementation of an advanced protocol.
Sample: The sample was conveniently obtained from study population and data was collected using direct observations and reviewing charts.
Data collection: 50 patient charts were reviewed, where 25 of the charts were for before implementation of the intervention (baseline data) and 25 charts for after implementation.
10 cases were observed weekly to understand provider adherence to the protocol.
Analysis: The data was analyzed using descriptive statistics to draw inferences based on identified trends. unpaired t-test was done to check any significant difference in readmission pre- and post-advanced TOC protocol implementation.

BIBLIOGRAPHY

Becker, C., Zumbrunn, S., Beck, K., Vincent, A., Loretz, N., Müller, J., ... & Hunziker, S. Interventions to improve communication at hospital discharge and rates of readmission: A systematic review and meta-analysis. JAMA Netw Open. 2021. 4 (8): e2119346. https://doi:10.1001/jamanetworkopen.2021.19346

Forstner, J., Straßner, C., Kunz, A., Uhlmann, L., Freund, T., Peters-Klimm, F., .& Szecsenyi, J. (2019). Improving continuity of patient care across sectors: study protocol of a quasi-experimental multi-centre study regarding an admission and discharge model in Germany (VESPEERA). BMC Health Services Research, 19(1), 1-10. https://doi.org/10.1186/s12913-019-4022-4

Heaton, J., & Tadi, P. (2020). Managed care organization. Treasure Island (FL): StatPearls. https://www.ncbi.nlm.nih.gov/books/NBK557797/

Jahan, A. R & Burgess D. M (2023). Substance Use Disorder. https://www.ncbi.nlm.nih.gov/books/NBK570642/

Lindmark, U., Bülow, P. H., Mårtensson, J., Rönning, H., & A.D.U.L.T. Research Group (2019). The use of the concept of transition in different disciplines within health and social welfare: An integrative literature review. *Nursing open*, *6*(3), 664–675. https://doi.org/10.1002/nop2.249

Timpel, P., Lang, C., Wens, J., Contel, J. C., Schwarz, P. E., & Manage Care Study Group. (2020). The Manage Care Model–Developing an evidence-based and expert-driven chronic care management model for patients with diabetes. *International Journal of Integrated Care*, *20*(2). doi: 10.5334/ijic.4646. PMID: 32346360; PMCID: PMC7181948.

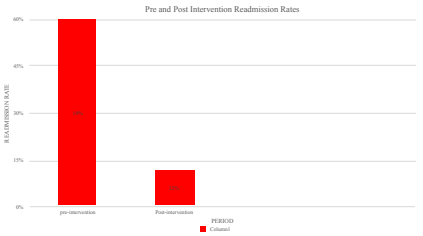
Warchol, S. J., Monestime, J. P., Mayer, R. W., & Chien, W. W. (2019). Strategies to reduce hospital readmission rates in a non-Medicaid-expansion state. *Perspectives in Health Information Management*, *16*(Summer). doi PMID: 31423116; PMCID: PMC6669363

RESULTS

t-Test: Two-Sample Assuming Unequal Variances

	Pre-intervention	*Post-intervention*
Mean	3	0.6
Variance	0.5	0.3
Observations	5	5
Hypothesized Mean Difference	0	
Df	8	
t Stat	6	
P(T<=t) one-tail	0.000162	
t Critical one-tail	1.85954 8	
P(T<=t) two-tail	0.000323	
t Critical two-tail	2.306004	

Week	1	2	3	4	5	Mean	Percentage
Weekly Count of compliant cases	8	10	10	9	8	9	90%



The data analysis reported that the protocol was effective in lowering readmission risk as it facilitated best practices in discharge planning, medication reconciliation, patient education and follow up care in SUD patients discharged at River Oak Treatment Center.
The readmission rate went down from 60% pre-implementation to12% after introducing the advanced protocol
In addition, there was a 90% adherence efficiency which meant that the protocol was simple for healthcare staff to understand and follow.

CONCLUSIONS

The study had limitations, including that it utilized a sample that was small which could limit its generalizability and did not have a control group which would aid in differentiating the effect of the protocol on readmission rate from other factors influencing the rates.
The research recommends that mental healthcare centers introduce the advanced model of transition of care in order to enhance SUD patient outcome. Future analyses should have a bigger sample size and a control group.
The researchers should try the TOC protocol with other hospitals and treatment facilities to determine whether the protocol reduces readmission rate for people with SUD in other settings.

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