

Outcomes Star™ Psychometric Factsheet: Young Person's Star™

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Background

The Young Person's Star is a version of the Outcomes Star for young people moving to independent living. It is suitable for young care leavers, those leaving young offender institutions and other young people experiencing homelessness or transition.

The Young Person's Star was developed by Triangle alongside 1625 Independent People, Coram, Newham Borough Council and the Shelter Trust. The collaborators contributed to the outcome areas and Journey of change and provided feedback on the tool as part of an iterative process of development and refinement. 1625 Independent People and Coram also piloted the draft version of My Star for over a year within their services. More information about the development of the Young Person's Star can be found in the organisation guide (Burns & MacKeith, 2014) and the overall principles behind the development of all versions of the Outcomes Star are described in MacKeith (2011).

Method and analytic strategy

Data on the acceptability and usefulness of the pilot version was gathered from keyworkers and service users (N = 144) in services provided by the collaborators at the end of the pilot period.

Young Person's Star data routinely collected and entered onto the Star Online was analysed by Triangle to test the Star's validity as an outcomes measurement tool. A full explanation of the analytic strategy is provided in the accompanying document – Outcomes Star Psychometric Factsheets: Overview.

The psychometric analyses used anonymised data collected by a licensed and trained charity that supports young people who are homeless/ at risk of homelessness to find accommodation, training and employment as well as supporting them in developing life skills. In total, 472 service users with at least one review Star reading were included. At the first Star reading, 59% of service users were homeless or in temporary accommodation, 42% were 'NEET' (not in education, employment or training), 44% had mental health issues and 25% were misusing drugs. Service users were aged between 16 and 25 (M = 19.72), mostly White British (71%) and there were slightly more males (60%) than females (39%).

Results

Do service users and workers view the Star as appropriate and useful?

Acceptability: The key points fed back at the end of pilot workshop, were that keyworkers felt that the Young Person's Star gives young people more control and allows workers to open a dialogue about young people's lives and the actions that are needed. Young people found completing the Star motivating and straightforward.

Does it make sense for the different outcome areas of the Star to be included in the same tool?

Factor Structure: The suitability of the data for factor analysis was confirmed, with most inter-items correlations above .30, a Kaiser-Meyer-Olkin value exceeding the recommended minimum value of 0.60 (Kaiser 1970, 1974) and a significant Bartlett's Test of Sphericity (Bartlett, 1954). This analysis yielded a unidimensional factor structure explaining 62% of the variance in scores.

Internal Consistency: Internal consistency was very good (Cronbach's $\alpha = 0.88$).

Is each outcome area measuring a unique aspect of the service user's situation?

Item redundancy: No inter-item correlation exceeded the 0.7 threshold, suggesting no redundancy between areas (see Table 1).

Does the Star detect change occurring within a service?

Responsiveness to change: Wilcoxon Signed Rank Test revealed a statistically significant increase in all outcome areas. A medium effect size was found for Practical life skills and small-medium effect sizes for all other areas (see Table 2).

Conclusion

These initial analyses suggest that the Young Person's Star is a valid outcomes measurement tool, which measures one underlying construct and is responsiveness to change.

Research is planned to examine consistency in understanding of the scales (inter-rater reliability) and the relationship between Star readings and other measures (convergent and predictive validity).

Further research

External research about the Star as an outcomes and keywork measure can be found on our website: <http://www.outcomesstar.org.uk/about-the-star/evidence-and-research/research-library/#all>

TABLE 1: Correlation matrix for outcome areas (N = 472)

	1	2	3	4	5	6	7
1 Accommodation							
2 Work and learning	.28						
3 People and support	.42	.40					
4 Health	.37	.42	.52				
5 How you feel	.30	.41	.53	.62			
6 Choices and behaviour	.40	.37	.42	.44	.38		
7 Money and rent	.42	.30	.38	.35	.36	.44	
8 Practical life skills	.25	.31	.35	.43	.44	.38	.43

TABLE 2: Responsiveness of the Young Person's Star

	First Star median	Final Star median	Z	Effect size r^2	n^2
Accommodation	3.00	4.00	-7.76***	0.26	438
Work and learning	2.00	3.00	-6.67***	0.23	413
People and support	3.00	4.00	-6.73***	0.25	372
Health	3.00	4.00	-6.97***	0.25	374
How you feel	3.00	3.00	-5.92***	0.21	382
Choices and behaviour	3.00	4.00	-5.30***	0.21	333
Money and rent	3.00	3.00	-7.35***	0.25	429
Practical life skills	4.00	4.00	-7.61***	0.30	324

*** $p < .001$

¹ Cohen provided rules of thumb for interpreting these effect sizes, suggesting that an r of .1 represents a 'small' effect size, .3 represents a 'medium' effect size and .5 represents a 'large' effect size

² Service users beginning at 5 were excluded for these analyses since they could not move forward

References

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