

MEASURES, INTERVENTIONS, AND OUTCOMES:
EXPLORING INPATIENT PSYCHIATRIC CARE

OVE SONESSON

Akademisk avhandling för avläggande av filosofie doktorsexamen i psykologi, som med tillstånd från Samhällsvetenskapliga fakulteten vid Göteborgs universitet kommer att offentligens försvaras fredagen den 5 december, 2014, kl. 10:00 i sal F1, Psykologiska institutionen, Haraldsgatan 1, Göteborg.

Fakultetsopponent är Professor Mikael Sandlund, Institutionen för klinisk vetenskap, Umeå universitet.

Artiklar som ingår i avhandlingen

- I. Sonesson, O., Tjus, T., & Arvidsson, H. (2010). Reliability of a functioning scale (GAF) among psychiatric ward staff. *Nordic Psychology*, *62*, 53-64.
- II. Sonesson, O., Arvidsson, H., & Tjus, T. (2013). Effectiveness of psychiatric inpatient care. *Scandinavian Journal of Caring Sciences*, *27*, 319-326.
- III. Sonesson, O., Arvidsson, H., & Tjus, T. (2014). Exploring outcome and validity of the GAF in psychiatric inpatient care. *European Journal of Psychological Assessment*. Advance online publication. doi:10.1027/1015-5759/a000225.
- IV. Sonesson, O., Arvidsson, H., & Tjus, T. (2014). Interventions in psychiatric inpatient care as described by the Swedish Classification of Health Interventions (KVÅ). Submitted manuscript.



UNIVERSITY OF GOTHENBURG
DEPT OF PSYCHOLOGY

DOCTORAL DISSERTATION

ABSTRACT

The general aim of this thesis was to investigate interventions and outcomes in psychiatric inpatient care through the use of assessment scales and database information. Another aim was to contribute to the knowledge of the Global Assessment of Functioning (GAF) scale in regard to reliability, validity and as a measure of the outcome of treatment.

Data in Study I were gathered from assessment sessions concerning the reliability of the GAF, and data in the following three studies were collected from the ELVIS healthcare information system used within Sahlgrenska University Hospital.

The reliability of the GAF scale was investigated in Study I using the GAF-ratings of six vignettes by 101 participants from an inpatient psychiatric clinic. The results demonstrated good reliability with an intra-class coefficient of 0.79. Background variables such as the number of years of experience in using the GAF and attitudes towards the GAF were entered into multiple linear regression analyses showing no statistically significant effect.

Study II investigated the outcome of inpatient psychiatric care in which the GAF was used as a measure of outcome. The sample consisted of 816 care episodes that were GAF-rated both at admission and at discharge. The difference between the patient's GAF value at discharge and admission was used as a measure of improvement in the global level of functioning. The overall GAF change was 20.7 points and represented a shift from a low to a moderate level of functioning. The effect size measure of Cohen's *d* showed an overall effect size of 1.67, corresponding to a high effect. Within the diagnostic categories, substance-related disorders showed the lowest effect size (1.03) and other mood disorders showed the highest (2.33). Of all of the patients in the study group, 75% had a GAF change ≥ 10 points and were considered improved.

Study III investigated the influence of clinical and socio-demographic factors on psychosocial functioning as measured by the GAF scale. Statistically significant predictors of GAF scores at admission were age, schizophrenia, other psychotic disorders, and no registered diagnosis. GAF scores at admission, most diagnoses, and being a patient at a specific ward were able to significantly predict the GAF scores at discharge. It was also found that specialised wards did not necessarily deliver the highest treatment results in spite of their diagnostic specialisation.

Study IV focused on interventions in inpatient psychiatric care as described by the Swedish Classification of Health Interventions (KVÅ). A KVÅ-code list elaborated within Region Västra Götaland was used, which consisted of 76 specific codes for psychiatric interventions. Staff at the wards registered these codes when specific interventions were performed. At least one KVÅ code was registered in 83% of all episodes of care, and five codes covered 50% of all registrations. Patients with a diagnosis of schizophrenia showed the highest share of coordinating interventions, and patients with a diagnosis within substance-related disorders showed the lowest share of psychological treatments. Medical technical and coordinating interventions were related to psychosocial functioning at discharge. It was concluded that with adequate registration of the quantity and quality of interventions, the KVÅ classification system could have the potential to describe the interventions used in inpatient psychiatric care. The four studies in this dissertation support the conclusion that a central database system could be useful to investigate interventions and outcomes in psychiatric inpatient care.

Keywords: classification, intervention studies, psychiatric inpatient care, outcome and process assessment, KVÅ

ISSN 1101-718X, ISRN GU/PSYK/AVH--306—SE, ISBN 978-91-628-9164-0

The e-published version of this dissertation: <http://hdl.handle.net/2077/37238>

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