Summary

Introduction

There has been a major change in the social climate of the Netherlands over the past twenty-five years. A fear-driven preoccupation with personal safety and the preservation of identity has now developed, and it is accompanied by a decline in tolerance of strange people and strange behaviour. This fear-driven, less tolerant attitude has become manifest in a reappraisal of the use of coercion. In a parallel development, there has been a devaluation of the empathic approach to deviant behaviour and, in particular, to our fellow human beings when they are perceived as different. These tendencies have had a far-reaching impact on psychiatry, embedded as it is in the social context. Partly as a result of these developments, the number of compulsory admissions in psychiatry has increased sharply, particularly in the major cities. This increase was found in both IBS admissions (admissions with *Inbewaringstelling*, acronym: IBS) and court orders (*Voorlopige Machtiging* admissions, acronym: VM). IBS admissions rose nationally from 22 per 100,000 inhabitants in 1979 to 53 per 100,000 in 2004. In the Amsterdam region, the number of IBS admissions between 1979 and 2004 actually rose by 261% to 86 per 100,000. The picture in Rotterdam and The Hague was comparable.

The increase in the number of admissions involving compulsion is in contrast with the scarcity of reliable scientific data about the short-term, but above all long-term, effects and side-effects. We still know very little, in particular about the effects from the point of view of the patients. How patients admitted under the IBS arrangements get on after that admission is also still quite unclear. We know that approximately 25% probably receive ongoing treatment under a court order, but we do not know what long-term effect this has in a scientific sense. Nor do we know anything about the subsequent fate of people who receive outpatient care after their IBS admission. And we hardly know anything at all about the effect of compulsory treatment on treatability in the future when that treatment is perceived negatively or as unjustifiable by a large group of patients. A UK study indicates that patients with a negative opinion about the treatment at the outset of their compulsory admission are at risk of a repeat compulsory admission. We do not know whether that is also the case for Dutch IBS patients. Are they readmitted later on a compulsory basis or do they continue to cooperate well with the required treatment? And when there are repeat compulsory admissions, which patients are involved?

Looking at the socio-demographic characteristics of the patients, only ethnic background seems to play a role in determining the probability of compulsory admission. Groups who are more likely to be compulsorily admitted are Dutch people with a Surinam, Antillean and Moroccan background. Previous research suggests that the increased risk for these groups could be explained by the fact that, when they come into contact with emergency psychiatric services, they are more often in a severe psychotic state that is perceived as dangerous than non-ethnic Dutch people in the same situation. We know virtually nothing about the role played by the social context with respect to the probability of a compulsory admission. In terms of clinical characteristics, it is clear that most compulsory admissions involve people

suffering from a psychotic disorder, in particular schizophrenia. These are patients with severe symptoms who are unwilling to undergo treatment. Of course, the assessment of the threat posed to the patient or others has also proved to be a determining factor. Patients who have undergone a compulsory admission in the past are also more likely to be readmitted on a compulsory basis than people without a similar history. This phenomenon is still not understood.

Research questions and hypotheses

The aim of the ASAP study is to establish a picture of the variables that determine the probability of IBS admissions for crisis patients with psychiatric illnesses. More particularly, we aimed to establish a better picture of the relationship between the incidence of IBS admissions on the one hand and prior psychiatric history, the course of the psychiatric disorder, the patient's social circumstances and patient opinions and experiences on the other. The ultimate objective was to identify patient-related and care-related factors that can be tackled through changes in treatment programmes, reducing the number of compulsory admissions.

This study answered six questions and appraised eleven hypotheses.

In *Chapter 3*, we looked at the changes there have been in the past 20 years in Public Mental Health Care and emergency psychiatry in Amsterdam, and what effect those changes have had on the probability of patients being compulsorily admitted in an IBS procedure after an emergency consultation. Our hypothesis (I) was that the emergency psychiatric service in Amsterdam saw more severe patients in 2005 and prescribed more IBS admissions than its predecessor in 1983.

In *Chapter 4*, we looked at psychiatric disorders as risk factors for IBS and at the role played by the severity of the disorder, danger, awareness of illness and treatment motivation. Here, our hypothesis (III) was that danger, and lack of illness awareness and treatment motivation, in addition to suffering from severe psychiatric illness, are the only determinants of the probability of IBS admission pursuant to an emergency consultation. In this chapter, we also looked at referral paths and prior psychiatric treatment as risk factors for IBS admission. Here, our hypothesis (IV) was that contact with the police prior to an emergency consultation is not an independent factor determining the probability of IBS admission after that consultation. In our hypothesis, the higher probability of IBS admission after referral by the police can be explained by the fact that police referrals include more patients who have severe psychotic symptoms, who are a danger to themselves or others, and who do not wish to cooperate with treatment. We assumed the same hypothesis (V) for referral by mental health services. We also studied the hypothesis (VI) that patients who receive intensive outpatient treatment in the year prior to an emergency consultation are less likely to undergo an IBS admission pursuant to an emergency consultation than patients who receive little or no outpatient treatment.

In *Chapter 5*, we looked at the socio-demographic characteristics of the patients admitted in an IBS procedure after an emergency psychiatry consultation compared with patients undergoing another intervention. Here, our hypothesis (II) was that some groups of Dutch people with

an ethnic background are more likely to undergo an IBS admission but that this increased probability is not attributable to their ethnicity in itself. This higher probability is explained by the fact that these patients present more often with a severe psychosis, that they are perceived more often as being dangerous and poorly motivated for treatment, and that they are also referred more often through the police as a result.

In *Chapter 6*, we examined the mechanism underlying the familiar observation that patients who have already undergone an compulsory admission are more likely to be readmitted again on a compulsory basis. We looked at three hypotheses associated with this mechanism. A history of compulsory admission predicts a negative opinion about prior psychiatric treatment and psychiatric services (VII). A negative opinion about prior psychiatric treatment is linked to problems with awareness of illness and a weak relationship with clinicians (VIII). Problems with awareness and a weak relationship with clinicians are linked to an increased probability of IBS admission during follow-up (IX).

And in *Chapter 7*, we turned to the role played by the amount and quality of social support as risk factors for an IBS procedure after an emergency psychiatric consultation. In this context, we have formulated two hypotheses on the basis of previous findings. Patients who live alone and have a small social network are more likely to be admitted on a compulsory basis than patients who live together with other people (X). Patients who say they feel they receive a lot of social support and patients who report few negative social interactions are less likely to undergo an IBS admission than patients who feel they receive little social support and patients who report a lot of negative social interaction (XI).

Method

The research method was described extensively in *Chapter 2,* and we will provide a brief summary here.

The research was conducted at the Psychiatry Emergency Service Amsterdam (PESA) and the Centre-Old-West Acute Treatment Unit (ATU).

The PESA provides emergency psychiatric services and crisis intervention services on a 24/7 basis in response to police referrals. Outside office hours, they also manage referrals from primary care (GPs and A+E departments) and the second line (mental health services). The ATU is a team that works during office hours, engaging primarily in emergency psychiatry and crisis intervention in response to referrals from GPs and the A+E departments of general hospitals in the Centre and Old West areas of Amsterdam.

The first stage was a prospective cohort study in which patients who underwent an IBS admission pursuant to a crisis consultation, and patients who did not, were compared in a *case-control* design. Patients aged between 18 and 66, and living in Amsterdam, who had an emergency consultation with the PESA during an unbroken period of two years were included in this part of our study. The recorded patient characteristics were: age, sex, country of origin and home situation. We made a note of the source of the referral and the psychiatric diagnosis according to DSM IV TR. To determine the severity of the current psychopathology, we

used the Severity of Psychiatric Illness rating scale (SPI). Information about psychiatric care consumption was obtained from the Amsterdam Mental Health Services database PSYGIS.
A second cohort was then established for a follow-up study by selecting patients from the basic cohort of Amsterdam patients aged between 18 and 66 who had at least one emergency consultation with the PESA *and* the ATU. A random sample was taken of 125 patients who were admitted voluntarily after the index consultation, as well as a sample of 125 patients who underwent IBS admission after their emergency consultation. These two samples made up the cohort for the second part of our study. The size of the sample was determined using a power analysis. The recorded patient characteristics were: age, sex, country of origin and home situation. We made a note of the source of the referral and the psychiatric diagnosis according to DSM IV TR. Information about psychiatric care consumption was obtained from the Amsterdam Mental Health Services database PSYGIS. The 250 patients were interviewed shortly after the emergency consultation. We used (among others) the following questionnaires during those interviews: the European version of the Verona Service Satisfaction Scale, the Birchwood's Insight Scale, the Service Engagement Scale (Tait), the Social Network Structure Questionnaire (van Sonderen) and the Social Resources questionnaire (Ruehlmann). Care consumption during follow-up was determined with the Amsterdam Mental Health database PSYGIS. Where demographic data for the Amsterdam population were necessary, these were obtained from the Research and Statistics office of the city of Amsterdam.
For the statistical analyses for both cohorts, we used bi-variate analysis with Pearson's chi square and Independent Samples T-test or Mann-Whitney U-tests. To calculate the odds ratios (with a confidence interval of 95%) and to test for the presence of confounders, we used multiple stepwise logistic regression.

Conclusions, recommendations and suggestions for future research

Chapter 3. The small front-line outreach service of 1983 has changed into a specialist psychiatric emergency department with a less pronounced outreach component. It handles more than twice as many consultations, with patients who are mostly in a more severe condition. The police have become the most important referrer for this service and, in 2005, four times as many psychiatric patients come into contact with the police compared to 1983. This has to be considered an unwelcome change. Voluntary admissions to psychiatric hospitals have virtually disappeared as a feature of the crisis service. In general, there are fewer psychiatric admissions and there is more treatment in the community (or no treatment) as an outcome of the consultations. We can also conclude that the annual number of IBS admissions in Amsterdam increased, mainly because the number of emergency consultations and proportion of police referrals both increased twofold. A striking finding is that, while police referrals more than doubled as a percentage of referrals, the proportion of compulsory admissions rose only from 17 to 20%. Therefore, we may assume that the PESA was successful in preventing unnecessary compulsory admissions.
Chapter 4. The severity of the disorder, danger and lack of treatment motivation proved, in

line with the statutory criteria, to be the main determinant factors in the probability of IBS admissions at the PESA. However, referral path and prior psychiatric history also affected the decision, independently of these three statutory criteria. Although this would appear to be undesirable from a formal, legal point of view, we do not know whether it also has a negative impact on the quality of the treatment and patient welfare.

Referral by the police and the mental health services make IBS more likely than referral by primary health care, independently of the severity of the disorder, danger and the lack of treatment motivation. Further research is required to clarify the mechanism underlying these correlations, as well as any possible negative effects for the patient. Is the psychological pressure exerted by an emergency referral from the police or mental health colleagues the factor that leads to clinicians in this situation opting more readily for IBS, independently of the explicit IBS criteria? Is this an undesirable phenomenon for the purposes of the welfare of our patients? In order to examine this question, it will be necessary to look at the course of treatment for IBS patients referred by the police and mental health services, and to compare this with the course of treatment of patients referred by primary health care, controlling for severity of disorder, danger and treatment motivation.

Patients receiving outpatient treatment of varying levels of intensity in the year prior to the consultation – more than 14 outpatient contacts in 11 months up to one month before the consultation – were admitted on a compulsory basis less often. Most probably they belong to a more cooperative group with less severe disorders. Before we can draw clinically relevant conclusions on the basis of this finding, we will have to know more about prior psychiatric treatment. We need to determine the precise nature and extent of prior psychiatric treatment, both outpatient and in the clinic, and to study the relationship with the outcome of the crisis consultation.

Chapter 5. The probability of an IBS admission after an emergency consultation was higher for three groups of immigrants than for native Dutch people: patients of Surinam & Antillean origin, the group with roots in sub-Saharan Africa and patients of Moroccan origin. The higher probability of IBS admissions proved to be mainly (with the exception of the small group from sub-Sahara Africa) attributable to the fact that these three groups were referred by the police, presenting in a psychotic condition. Patients with their roots in sub-Sahara Africa were possibly perceived to be more dangerous and more poorly motivated than native Dutch people. Two issues must be addressed before the clinical relevance of these findings can be determined. Why do patients with roots in Sub-Saharan Africa and patients with a Moroccan background receive second-line care less often before emergency consultations than native Dutch people with the same psychiatric problems? Why is it that the group of patients of Surinam and Antillean origin, despite second-line care beforehand not differing significantly from native Dutch, are more likely to undergo an IBS admission as an outcome of an emergency consultation than the group of native Dutch people?

Chapter 6. A history of compulsory admission proved to be closely linked to the probability of an IBS admission as the outcome of an emergency consultation, independently of socio-

demographic variables, diagnosis, severity of symptoms, danger and treatment motivation. There are strong indications that the level of satisfaction with psychiatric treatment in the recent past) plays a role in the probability of repeat IBS admissions: the higher the level of satisfaction the lower the risk of IBS. On the basis of this finding, and a comparable finding in UK research, we have a recommendation to make. Patients admitted compulsorily should be asked explicitly (using a standardised method) for their opinions about the treatment and the clinicians on a regular basis throughout their treatment, either outpatient or inpatient. Using the results of this systematic feedback, negotiations can be initiated with the patient with the aim of improving the quality of the working relationship and satisfaction with the treatment.
A randomised controlled trial can then be used to determine whether this intervention reduces the probability of repeat compulsory admissions.
Chapter 7. Living alone was associated with an increase in the probability of IBS admission during follow-up by comparison with living together with other people (an odds of three to one). We found that these patients had a smaller social network. A high level of reported negative interactions increased the risk of compulsory admission only for patients who lived alone.
This results in a recommendation. Patients living alone (with a small social network) should not be returned without further precautions to their deprived home situation after an initial compulsory admission. This group must receive targeted assistance to rebuild a more extensive system of support. This process should start before they return to the community. Where possible, this should be done by helping them to re-establish old relationships using family therapy or other system-based interventions. Where it is not possible to re-establish old relationships, they will need help to organise a new, broader system of support. Sheltered accommodation, group accommodation, structured daily activities and all other forms of participation in social relationships should be considered here.
A randomised controlled trial can then be used to determine whether this intervention reduces the probability of repeat compulsory admissions.