1. Introduction

Worldwide more than 9.25 million people are currently being held in penal institutions. As recently assessed, their number is rapidly growing, having increased by approximately a quarter of a million during a period of 18 months (International Centre for Prison Studies 2007). Prison population rates vary considerably between different regions and countries the capacities and overall quality of the penal systems differ likewise.

However, in prisons and penitentiaries worldwide, mentally disordered inmates constitute a serious problem, despite the standard doctrine in most countries that mentally ill offenders lacking criminal responsibility are not to be punished but referred to and detained in forensic psychiatric facilities for specialised care. Complex legal frameworks and judicial procedures have been implemented internationally to regulate this, and forensic psychiatry has been able to provide treatment programmes that are both effective and able to enhance public safety (Salize & Dressing 2006).

Nevertheless, it is confirmed that the prevalence of psychiatric morbidity among prisoners by far exceeds the rate of mental disorders in the general population although international research on this issue is limited. A review of 62 prison studies covering more than 23,000 prisoners worldwide found that 3.7 % of all male and 4% of all female prisoners had a psychotic disorder, 10 % of all male and 12% of all female prisoners suffered from major depression, and 47 % fulfilled the criteria for an antisocial personality disorder (Fazel & Danesh 2000).
Additionally, there is scientific evidence that the number of mentally disordered prison inmates is rising. As a consequence, the World Psychiatric Association (WPA) and the American Psychiatric Association (APA) have repeatedly voiced concern about the increasing number of mentally ill individuals being placed in correctional facilities (Okasha 2004). In the United States, prison services are estimated to house consistently twice as many persons with serious mental disorders as do mental hospitals (Torrey 1995). European prisons face similar problems. Older studies estimated that about 12 % of prisoners needed psychiatric treatment (Gunn et al. 1991).

The reasons for rising proportions of mentally disordered prison inmates are manifold and complex. National conditions and circumstances play a pivotal role, but there are international trends in mental health care or other societal fields, too, that are likely to contribute to the problem.
Rising levels of alcohol abuse and illicit drug use in almost all societies increase exponentially the prevalence of these disorders in penitentiaries or prisons worldwide (Andersen et al. 1996, Bland et al. 1996). Many experts see the growing incidence of mental health problems in prisons as an unwelcome consequence of the deinstitutionalisation process that was and is the basic programme of any psychiatric reform anywhere in the world. According to this hypothesis, closing down psychiatric hospital beds much faster than a sufficient number of community care services are or can be implemented may foster the neglect of non-compliant or violent mentally ill patients in community mental health care and compound the tendency of shifting them towards forensic psychiatric facilities or the prison system (Lamb & Mills 1986, Munk-Jörgensen 1999, Schanda 1999, Müller-Isberner 2002). More globally, an invariant and inverse correlation between the number of psychiatric hospital patients and the number of prisoners has been identified, turning out to beg so remarkably robust that it has been labelled with its own specific term, the so-called “Penrose Law” (Brink 2005).
Underlining such interdependencies, the WHO recently stated: “One of the difficulties in keeping mentally ill offenders out of prison is that many countries do not have appropriate facilities to house people regarded as criminal and dangerous. As a result, those with mental disorders are not only forced to stay in prison, but also are deprived of the necessary treatment there.” (WHO 2005).

Thus, the rising psychiatric morbidity in prisons may reflect a general trend within societies to tolerate insufficient provision of psychiatric services in the community (Andersen 2004). Particularly poor economies or societies in transition are forced to allocate scarce health care resources to sectors with a wider public recognition. This increases the risk that persons suffering from mental disorders

will be neglected during incarceration. The problem not only imposes a heavy financial burden on acceding or applicant countries, but also on long-term Member States of the European Union. However, in most countries, the budgets for prison mental health care are widely unknown, as are the exact number of lacking staff or other resources.

A study from Finland revealed that in cases of prison suicides, only half of the subjects concerned had been in contact with medical prison services prior to their self-inflicted death (Joukamaa 1997). That long-term prisoners obviously adapt better than either short-term or remand prisoners (Coid 1984) and the early phases of a prison term bear the highest suicide risk (Dooley 1990) may demonstrate the complexity of the problem. Another WHO study from the late 1990s ("Health in Prisons Project") surveyed 13 European countries regarding prison mental health care. Although having assessed ambiguous and incomplete data, the results suggested that none of the 13 analysed prison systems had a sufficient number of specialised beds available to provide adequate treatment for mentally disordered prisoners (Blaauw et al. 2000). Contributing evidence to the assumption of many NGOs or other organisations active in the field that most prison systems are ill-equipped in terms of the mental health care available for their inmates (Human Rights Watch 2003), the study stressed an urgent need for further research.

Both from a professional psychiatric and a human rights perspective, depriving mentally disordered prisoners of any state-of-the-art treatment cannot be accepted. But in European routine care even the most basic requirements for adequate treatment seem to be missing. The scarce research findings suggest strongly that only a small proportion of all mental disorders prevalent in prison populations is diagnosed at all, although a thorough mental state assessment of every new detainee would be an indispensable prerequisite to prison entry. Not only would this be absolutely essential for any adequate psychiatric treatment during the prison term, but combined with regularly repeated screenings it also would allow mental disorders already present prior to the prison term to be distinguished from those acquired during the stay, e.g., whose etiology can be ascribed to unfavourable prison conditions.

Due to the serious shortage of information and data in the field, a systematic descriptive international comparison of the situation of mentally disordered prison inmates and the current state of prison mental health care is overdue – in Europe and worldwide. A standardised description of the concepts and the most urgent problem areas would allow further analyses and provide a basis for identifying models of good practice – if indeed there are any at all in this neglected field. Due to the complex interactions, such an overview must address many influencing factors and methodological pitfalls and, including the organisation of national prison systems, the overall concepts of (mental) health care provision in prisons, separate regulations for prisoners on remand and prisoners, the interaction between general psychiatry, forensic psychiatry and the national prison systems, varying pathways to mental health care, and many more issues.

So far no European overview referring to the above-mentioned problems and aspects has ever been conducted. Thus even the most basic data shortages and information gaps have never been systematically explored or described. This study tries to bridge this gap by collecting structured information on concepts, models, and routine practices in prison mental health care in 24 European Union Member States and other European countries.
By providing most basic information, it is targeted to encourage further research on this crucial issue and contribute to a European mental health policy and common actions in the field of prison mental health care.

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2. Study

This study was funded by a grant from the public health programme of the European Commission (Grant Agreement No. 2004106 EUPRIS) and conducted from 1st October 2005 to 31st October 2007.
It included 24 countries from the European Union and EFTA countries (see below). The study centre was located at the Central Institute of Mental Health (CIMH) in Mannheim, Germany and co-headed by Hans Joachim Salize and Harald Dressing from the CIMH. Coordinator was Christine Kief, CIMH.

The primary study aims were to describe and analyse the concepts of and approaches to the provision of psychiatric services for mentally ill or disordered prison inmates in the included countries and its outcomes (e.g., in terms of the prevalence of mentally ill or disordered persons being incarcerated in the various prison systems). Additional aims were to explore and analyse the availability of information about these issues on an official national level (health reporting or juridical data).

The topic of this study relates in part to two previous research projects funded by the public health or health promotion programmes of the European Commission, which outlined the approaches to civil detention and forensic psychiatric care in Europe. These were the studies "Compulsory admission and involuntary treatment of mentally ill patients – Legislation and practise in European Union Member States" and "Placement and Treatment of Mentally Ill Offenders – Legislation and Practise in EU Member States". Adopting similar study designs, both projects were conducted by the leaders of this study between 1st October 2000 and 1st January 2002 (EU Grant Agreement No. SI2.254882/2000CVF3-407) and from 1st January 2003 to 30th September 2004 respectively (EU Grant Agreement No. SPS.2002448).

Different from the former studies, the focus of this study was on persons suffering from mental disorders and *not* being patients in the general psychiatric or the forensic psychiatric system, but incarcerated in the penitentiaries of the countries included in this study. These persons differ from mentally ill offenders who are detained in the various forensic psychiatric systems, since prison inmates with mental health problems usually were considered during their trial as being criminally responsible for their offences, and whose mental disorder - if at all prevalent prior to the prison sentence - was not found to be associated with the committed crime.
Nevertheless, when suffering from a mental disorder, these persons are in need of treatment and – according to basic human rights principles – should be given treatment on a standard equivalent to that for non-incarcerated patients. This study explores if and how such care is arranged or organised.

This study document provides

- a general outline of the issue,
- a structured presentation of results from a detailed assessment of the issue covering all included countries (including tables and figures),
- 24 chapters (one for each participating country) reporting in a semi-structured way the country-specific approaches to, problems with or policies on prison mental health care,
- an analysis of the similarities or differences across the included countries,
- a synopsis of the current situation in each of the participating European Union Member States and EFTA-countries, and
- a concluding chapter outlining major problems and discussing consequences for action taking.

Work Plan

The implementation of the project involved the following tasks:

- The Setting up of a network of experts on mental illness in the prison system from each participating country.
- Development of a questionnaire to collect relevant information from the experts of the participating countries in a standardised way (for details, see below).
- Development of guidelines for writing a chapter containing complementary information to the systematic data gathered through the questionnaire. The chapters described specific characteristics, problems or circumstances of each participating country regarding the structure of their prison system, provision of mental health care in prisons , epidemiology of mental disorders in prisons, quality standards etc. The chapters were written by the experts.
- Assessment of the current situation of mental health care provision in prisons in the participating countries by means of the questionnaire.
- Analysis and comparison of the information provided by the experts (chapters and questionnaires). Preparation of preliminary results and a draft synopsis, which served as background papers for an expert meeting.
- Organisation of a meeting to discuss preliminary results, latest developments on this issue, similarities and differences between national concepts, as well as perspectives for future cooperation on a wider European level attended by at least one expert from each participating country,
- Summarising the discussion, results, and conclusions from the expert meeting.
- Writing a study report and dissemination of the results.

Network of Experts

Experts from 24 countries were subcontracted and collaborated in this study. Almost half of them had contributed to the previous studies on civil detention or forensic psychiatry referred to above, and therefore were familiar with the study design and overall work plan. All experts agreed to fill in the study questionnaire, to write a country-specific chapter on mental health care provision in prisons and to attend an expert meeting to discuss preliminary results. The experts were also obliged to inform their responsible ministries of their collaboration in this study. The board of experts comprised:

- Austria — Hans Schanda, Göllersdorf
- Belgium — Paul Cosyns, Roel Verellen, Egedem
- Bulgaria — Toma Tomov, Rumen Petrov, Sofia
- Cyprus — Evangelos Anastasiou, Louis Kariolou, Nicosia
- Czech Republic — Jiři Raboch, Prague
- Denmark — Peter Kramp, Copenhagen
- England & Wales — David V. James, Enfield
- Finland — Riitakertuu Kaltialla-Heino, Tampere
- France — Pierre Lamothe, Frédéric Meunier, Lyon
- Germany — Norbert Konrad, Berlin
- Greece — Giorgos Alevizopoulos, Athens
- Hungary — László Lajtavári, Budakeszi
- Iceland — Jon Fridrik Sigurdsson, Reykjavik
- Ireland — Enda Dooley, Longford
- Italy — Angelo Fioritti, Bologna
- Lithuania — Dovile Juodkaite, Virginija Klimukiene, Vilnius
- Luxembourg — Georges Rodenbourg, Ellen Bernhardt-Kurz, Ettelbruck
- The Netherlands — Katy (C.H.) de Kogel, Den Haag
- Norway — Ellen Kjelsberg, Oslo
- Poland — Andrzej Kiejna, Tomasz Hadrys, Wroclaw
- Portugal — Miguel Xavier, Lisboa
- Slovenia — Andrej Marušič, Vita Poštuvan, Ljubljana
- Spain — Francisco Torres-González, Granada, Luis F. Barrios-Flores, Alicante
- Sweden — Orsolya Hoffmann, Stockholm

Assessment Tools and Objectives

The study gathered detailed information on concepts, legal regulations and practise concerning the treatment of mentally disordered prison inmates in the participating countries. The major assessment tool was a detailed questionnaire. The development of the questionnaire and the selection of single items were based upon an exhaustive literature review and the knowledge and expertise of the project staff. Finally, the questionnaire comprised more than 90 specific items, including both structured and unstructured questions, and covered the following topics (among others):

- Responsibility for and availability of information on mentally ill or disordered prison inmates as well as on mental health care provision within the prison system,
- Structure and capacity of the prison system including prison health care,
- Prison population,
- Prevalence and incidence of mental disorders of prison inmates,
- Mental health care capacities within the prison system (including staff, annual budget, specific treatment programmes etc.),
- Screening or diagnostic procedures and treatment programmes for mentally disordered inmates,
- Release planning and aftercare,
- Collaboration of prison system with general mental health care system and forensic psychiatry,
- Outcomes of prison mental health care provision (e.g., suicide rates in prisons),
- National research activities in the field,
- Gaps and shortages of information on these items.

Because of the complexity of the issues concerned, the questionnaire had to strike a balance between questions on empirical data and open questions about specific national characteristics that are hard to describe in a structured way. A major part of the work during the first study phase was devoted to the development of this questionnaire. Additionally, guidelines for the composition of the country-specific chapters were developed. The national chapters were supposed to focus on issues and national particularities that cannot adequately be explored by means of a questionnaire, such as the advantages and the limitations of the current system or practical problems. Both the questionnaire and the guidelines on the national chapters were forwarded to all experts.

Expert Meeting

A two-day expert meeting was held in Mannheim, Germany, from 15th - 16th December2006. From the panel of experts, delegates from 18 countries attended the meeting.
The meeting started with an overview of the study status quo. Afterwards, a summary of preliminary results derived from the study questionnaires filled in by the contracted experts was presented by the coordination team. The following issues were covered:

- Structure of the European prison systems,
- Assessment and treatment of mentally disordered prisoners,
- Psychopharmacological treatment for prison inmates,
- Release planning and aftercare routines,
- Involuntary treatment,
- Psychiatric prevalence in prisons,
- Personality disorders in prison systems,
- Quality standards for prison mental health care,
- Ethics and human rights aspects.

The presentations were followed by the completion of missing information from the included countries, a clarification of queries and an extensive discussion of preliminary results. Among other points, the discussion focussed on key criteria for describing prison mental health care or for defining what constitutes a psychiatric bed in a medical prison ward. There was overall agreement on the complexity of the major issues covered by the study, requiring clear definitions of key concepts, responsibilities,

assessment or treatment procedures. It was agreed that the comparison of epidemiological data, i.e., time series on mental disorders in prisons, requires unambiguous descriptions of included patient groups and diagnoses, which are seriously affected by the rather poor reporting standards on the part of the included countries. The attendees stressed the great need for further research activities.

Dissemination of Research Results

Dissemination of (preliminary) research results started during the study period and has continued to be an integral part of the group's activities.
At the Annual Meeting of the German Society for Psychiatry Psychotherapy and Neurology (DGPPN), held in Berlin, Germany from 22nd November to 26th November 2006, a presentation was given on "The care for mentally disordered inmates in the European prison systems – the EUPRIS study". The presentation included an overview of the study design and methods, as well as preliminary results. Another symposium presenting the results of the EUPRIS Study is scheduled for the subsequent DGPPN meeting, to be held in November 2008 in Berlin, Germany.

Results were also presented at the World Psychiatric Associations Thematic Conference "Coercive Treatment in Psychiatry: A Comprehensive Review", held from 6th - 8th June 2007 in Dresden, Germany. In the session "Care for Mentally Disordered Prison Inmates in Europe", that was co-chaired by the leaders of this project, three papers were presented that summarised specific aspects of this project. Apart from a general overview of the study results, the situation in Poland and in the Netherlands was highlighted by the Polish and Dutch collaborators on this study.

Additionally, an overview of the study results was given by the study leader at the Meeting of the Working Party on Information on Lifestyle, Specific and Deprived Population Groups, held in Luxembourg, 19th April 2007.

In October 2007, a set of key indicators on the issue was sent to the European Health Indicators Project Group (ECHI) as a proposal for inclusion in the ECHI comprehensive indicator list ("long-list"). The indicators were proposed according to the general format of the ECHI long-list and included:

- ***„Suicides"*** and ***„Suicides in prison/detention",*** to be added to ECHI-long-list indicator 2.2.5 (health status/mortality cause specific/mental, behavioural)
- ***„Suicide attempts in prison/detention",*** to be added to ECHI-long-list indicator 2.3.5 (health status/morbidity disease specific/mental, behavioural)
- ***„Health care staff in prisons/detention*** *(by physicians, psychiatrists, psychologists, nurses)",* to be added to ECHI-long-list indicator 4.2.2 (health care resources /manpower)
- ***„Psychiatrist's training for involuntary/forensic/prison treatment",*** to be added to ECHI-long-list indicator 4.2.3 (health care resources /education)
- ***„Inpatient or hospital episodes of prison inmates*** *(by selected diagnoses including mental disorders)",* to be added to ECHI-long-list indicator 4.3.1 (health care utilisation / inpatient care utilisation)
- ***„Referrals of prison inmates to NHS-hospitals*** *(by selected diagnoses including mental disorders)"* to be added to ECHI-long-list indicator 4.3.1 (health care utilisation / inpatient care utilisation)
- ***„Expenditures on prison health care",*** to be added to ECHI-long-list indicator 4.4.3 (health expenditures and financing / expenditures on medical services).

The selection and decision process by the ECHI group is still ongoing during the finalisation of this report.
The dissemination activities will be continued. Due to the relevance for decision makers, programme administrators, researchers, NGOs and other stakeholders in the field, major results from the study will be published in international scientific journals as well as presented at symposia and scientific congresses.

Communication with the European Commission and Report Writing

Communication with the Directorate-General Health and Consumer Protection took place whenever required by e-mail or phone. The interim activity report, as well as a financial interim report, were submitted to the Directorate-General by June 2006. This final study document was forwarded to the Directorate-General Health and Consumer Protection at the end of the funding period.

3. Results

The following section presents the results from the survey which was conducted as a central part of this study. The section describes separately the results for each of the following topics:

- Structure of European Prison Systems
- Mental Health Care Capacities in Prison
- Mental State Screening and Assessment / Pathway to Care
- Psychopharmacological Treatment
- Involuntary Treatment in Prison
- Prison Release / Aftercare
- Prison Population / Psychiatric Prevalence in Prison
- Quality Standards for Prison Mental Health Care
- Ethics and Human Rights Aspects

By summarising and comparing the collected data in a standardised way, it provides an overview of the current situation of prison mental health care in the included countries.

The chapter relies almost completely on data from the study questionnaire which was filled in by the collaborating experts. When necessary, additional non-standardised information as contributed by the experts was also included. In a few cases, information form other sources was added.

Structure of European Prison Systems

To analyse the current state of mental health care provision for prison inmates, basic information on the structure and the capacity of national prison systems is crucial. Without such estimates, the effectiveness of prison mental health care cannot be evaluated.

Prison Capacities

Table 1 outlines the variety of the prison capacities in terms of places in all kind of prisons or remand prisons of the countries included in this study.
The most basic standardised indicator (prison places per 1,000 population) suggests a considerable variation throughout Europe[1]. With rates above 1.0 per 1,000 population, Eastern European countries show an overall tendency towards larger prison capacities. Slovenia is located at the lower end of the range and is an exception, whereas Lithuania reports the largest prison capacities among all included countries. On a much lower level compared to Eastern Europe, Scandinavian countries share common rates, too, which lay below 0.8 per 1,000 population. In Southern Europe the situation is more heterogeneous, with surprisingly low prison capacities in Cyprus and Greece.

Although not a very reliable indicator, the capacity of the largest national prison may demonstrate the degree of centralisation of a national penitentiary system. However, less populous countries necessarily operate a small number of penitentiaries that are likely to cover a large proportion of all prison places (e.g., Iceland, Luxembourg, Cyprus, see table 1). Nevertheless, many European countries still run large prison services providing 1,000 or more places. Although it may be easier to provide centralised health care services or medical wards to large penitentiaries, large or old prisons are more likely to pose a number of unfavourable mental health conditions for inmates.

In almost all countries included in this study, there were no significant changes of prison capacities over time throughout the last fifteen years (see figure 1 or table 2). Significant changes would probably suggest a need to adapt the capacities or even the structure of prison health care.

In general, the number of prison places may indicate a certain size of a penitentiary system and may thus provide basic background information. However, from a prison health care perspective, the occupancy figures for penal institutions would be a much stronger indicator in evaluating the quality of health care provision – even more so, when the actual occupancy may override the nominal prison capacities, as is the case in many countries (see table 27).

[1] Although the experts collaborating in this study were asked to report the overall numbers of national prison and remand prison places, comparisons should be drawn cautiously due to the lack of international standardisation and varying prison systems. It could not be completely ruled out that some countries reported figures that included the capacities of detention centres for illegal immigrants, juvenile prisons, or similar institutions, whereas other countries may have excluded them.

Table 1: Prison Capacities in European Countries

Country, year	No. of prison services	Total no. of prison places	Prison places per 1000 population	Capacity of largest prison (number of places, name or location of prison)	Share of places in largest prison
Austria, 2005	27	8,360	1.02	1,258 (JA Wien-Josefstadt)	15 %
Belgium, 2005	33	8,147	0.81	694 (Prison Lantin in Liège)	8.6 %
Bulgaria, 2005	13	13,750	1.76	2,000 (Central Prison of Sofia)	14.6 %
Cyprus, 2005	1	340	0.44	340 (Cyprus Prison Dep.)	100 %
Czech Republic, 2005	35	18,784	1.8	1,196 (Pilsen Prison)	6.4 %
Denmark, 2005	57	4,149	0.72	429 (Vestre Fængsel)	10.3 %
England & Wales, 2005	93	69,394	1.11	1,406 (Liverpool)	2 %
Finland, 2005	35	3,379	0.65	330 (Lounais-Suomen)	9.8 %
France, 2005	188	48,603	0.78	3,830 (Prison de Fleury-Merogis)	7.9 %
Germany, 2005	199	79,687	0.97	1,571 (JVA Tegel)	6.4 %
Greece, 2006	30	5,284	0.48	640 (Korydallos Prison)	11.5 %
Hungary, 2005	33	11,263	1.12	1,214 (Palhalma, National Prison)	10.8 %
Iceland, 2005	5	137	0.47	87 (Litla-Hraun Prison)	63.5 %
Ireland, 2004	14	3,341	0.81	475 (Midlands Prison)	14.2 %
Italy, 2005	207	42,771	0.73	1,387 (Poggioreale, Napoli)	3.2 %
Lithuania, 2005*	15	9,476	2.79	1,554 (Alytus Correctional Institution)	16.4 %
Luxembourg, 2005	2	776	1.72	679 (Centre Penitentiaire de Luxembourg)	87.5 %
The Netherlands, 2005*	66	17,757	1.08	998 (Penitentiair Instituut Flevoland)	5.6 %
Norway, 2005	46	3,273	0.71	354 (Oslo Prison)	10.8 %
Poland, 2005	156	71,435	1.87	1,470 (Wronki Prison)	2.1 %
Portugal, 2005	56	12,356	1.19	887 (Estabelecimento Prisional de Lisboa)	7.2 %
Slovenia, 2006	7	1,103	0.55	296 (Dob Prison)	26.8 %
Spain, 2005	77	45,811	1.43	unknown	unknown
Sweden, 2005*	86	6,707	0.73	257 (Kriminalvarden, Anstalten Kumla)	3.8 %

** The Netherlands: This figure includes 20 cluster of prisons with in total 66 locations, prisons or jails (1,258 places for illegal immigrants are included, juvenile institutions are excluded; Lithuania: In 2007 a probation model was implemented that is expected to lower the number of prisoners considerably*
Sweden: Juvenile prisons, detention centres and jails (administrated by police) were excluded;, Denmark and some other countries may have excluded places for custody prior to deportation.
All countries: population data origin used for calculating population based rates: Eurostat 2006

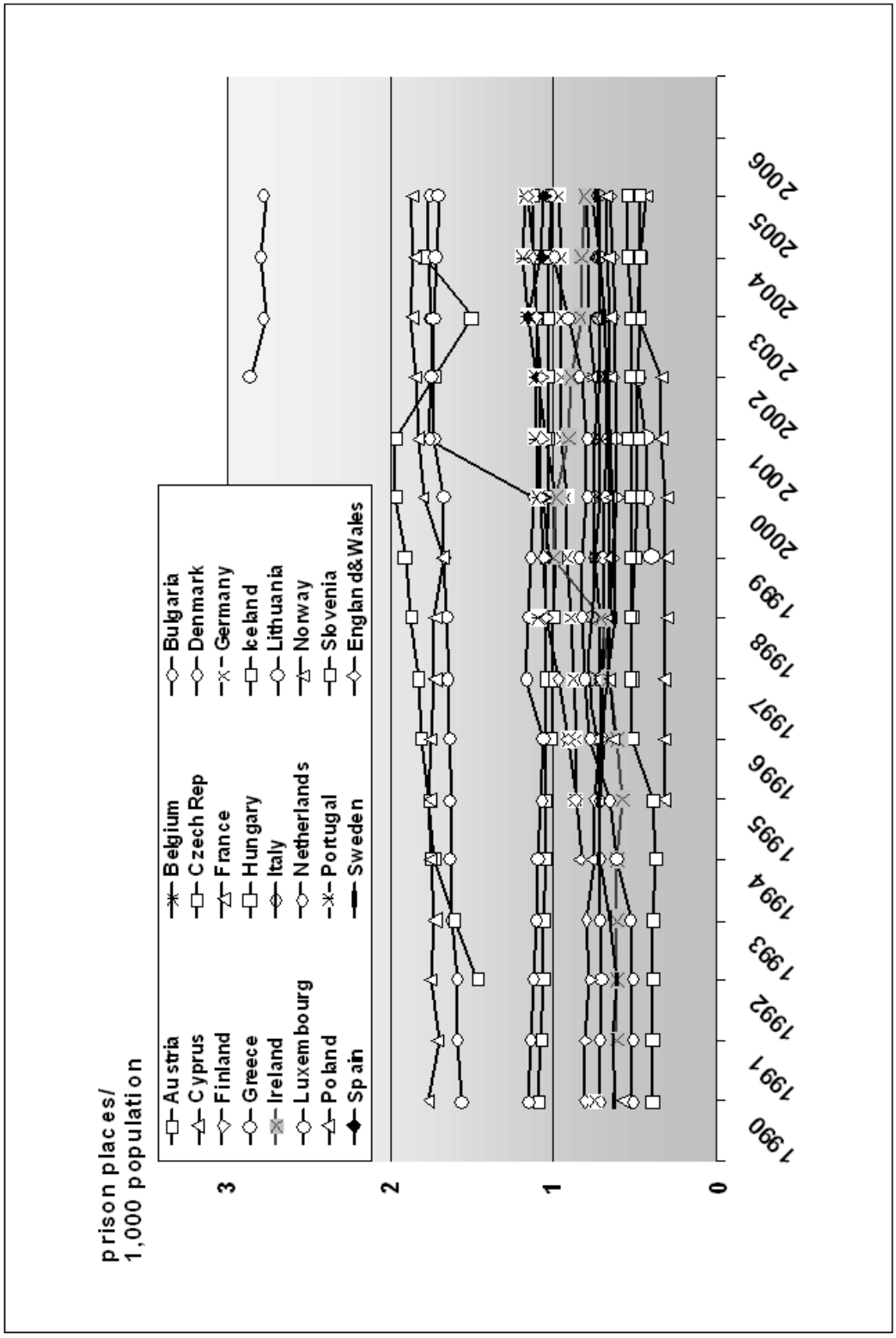

Figure 1: Change of Prison Capacities in European Countries, Time series 1990 – 2005 (Prison Places per 1,000 Population)

Table 2: Change of Prison Capacities in European Countries, Time series 1990 – 2005 (Prison Places per 1,000 Population)

	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005
Austria	1.09	1.08	1.07	1.06	1.05	1.05	1.05	1.05	1.05	1.05	1.04	1.04	1.04	1.03	1.03	1.02
Belgium								0.72	0.72	0.75	0.73	0.72	0.76	0.78	0.78	0.81
Bulgaria	1.57	1.59	1.6	1.62	1.63	1,63	1.64	1.65	1.66	1.67	1.68	1.73	1.74	1.75	1.76	1.77
Cyprus	0.37	0.36	0.35	0.34	0.33	0.33	0.32	0.32	0.31	0.31	0.31	0.34	0.34	0.48	0.47	0.44
Czech Republic			1.46	1.61	1.74	1.76	1.81	1.83	1.87	1.91	1.97	1.97	1.73	1.51	1.8	1.83
Denmark	0.73	0.72	0.71	0.72	0.72	0.73	0.7	0.71	0.7	0.7	0.69	0.67	0.67	0.7	0.72	0.77
England & Wales					0.84	0.87	0.91	0.97	1.05	1.06	1.08	1.08	1.08	1.11	1.13	1.16
Finland	0.81	0.81	0.78	0.8	0.76	0.75	0.72	0.71	0.65	0.64	0.61	0.61	0.63	0.63	0.64	0.65
France	0.57						0.76				0.79		0.78			0.78
Germany	0.75					0.87	0.87	0.88	0.9	0.92	0.93	0.95	0.95	0.95	0.96	0.97
Greece										0.41	0.43	0.44	0.48			
Hungary							1.02	1	1	0.99	0.98	1.05	1.1	1.11	1.12	1.12
Iceland	0.4	0.4	0.39	0.39	0.38	0.39	0.51	0.51	0.51	0.5	0.49	0.48	0.48	0.47	0.47	0.47
Ireland		0.61	0.62	0.62	0.62	0.59	0.61	0.66	0.71	1	0.98	0.91	0,9	0.84	0.83	0.81
Italy						0.72	0.74	0.78	0.77	0.75	0.75	0.75	0.73	0.73	0.73	0.73
Lithuania													2.86	2.77	2.79	2.77
Luxembourg	1.16	1.14	1.13	1.11	1.1	1.08	1.07	1.17	1.16	1.14	1.13	1.77	1.75	1.74	1.72	1.71
The Netherlands	0.52	0.51	0.51	0.53	0.62	0.66	0.78	0.81	0.83	0.84	0.8	0.8	0.89	1.01	1.11	1.09
Norway	0.56	0.6	0.58	0.62	0.62	0.62	0.63	0.66	0.65	0.66	0.65	0.65	0.65	0.65	0.67	0.68
Poland	1.77	1.71	1.75	1.73	1.75	1.76	1.75	1.73	1.73	1.68	1.8	1.83	1.85	1.87	1.86	1.87
Portugal							0.91		1.1		1.1	1.11	1.11	1.16	1.19	1.17
Slovenia								0.53	0.53	0.53	0.53	0.54	0.53	0.53	0.55	0.55
Spain										1.04	1.06		1.11	1.16	1.08	1.06
Sweden	0.63	0.64	0.62	0.65	0.73	0.73	0.71	0.67	0.63	0.63	0.64	0.66	0.68	0.7	0.73	0.74

Administrative Responsibility for Health Care Provision in Prison

On a theoretical level, administrative responsibility may provide a criterion to categorise prison mental health care in terms of general approaches. These may include

- prison mental health care as a responsibility of general mental health care (model 1)
- provision of mental health care for prison inmates as an integral part of the detention or penitentiary system (model 2)
- provision of mental health care for prison inmates as part of forensic psychiatry (model 3).

Each model may entail specific consequences affecting financial, administrative, security or training aspects and may bear certain disadvantages. In reality, these approaches are not clearly distinct from one another. Responsibilities may overlap in a complex way. Usually, judicial authorities, prison administrations, and the department of health are forced to interact and to collaborate in providing health care for prisoners. So the decision as to which department or agency holds general responsibility for prison health care and how the actual service provision is regulated and coordinated may have a significant impact.

Table 3: General Responsibility for Prison Health Care Provision (Including Prison Mental Health Care)

Ministry of Justice / Prison Administration	***Ministry of Health / National Health Service (NHS)***	***Mixed or split responsibility (NHS/Ministry of Health and Prison Administration / Ministry of Justice)***
Austria	*Cyprus*	*Hungary*
Belgium	*England & Wales*	*Luxembourg*
Bulgaria	*France*	*Slovenia*
Denmark	*Iceland*	*Italy**
Finland	*Norway*	
Germany		
Czech Republic		
Greece		
Ireland		
Lithuania		
The Netherlands		
Poland		
Portugal		
*Spain**		
Sweden		

** Italy: NHS only for drug addiction treatment*
Spain: Prison administration is under the responsibility of the Ministry of Internal Affairs

It may reduce bureaucracy if health care professionals in the prison sector work under the same authority as other prison staff. However, running a separate system of prison health care under juridical authority that is more or less divorced from the general health care system may entail a tendency to duplicate services and risk inefficacy or inequality. Budget restrictions may force prison administrations to give preferential treatment to safety aspects at the expense of health care requirements. On the other hand, the opposite approach of a general health care responsibility for prison health care may pose specific administrative obstacles to coordinating public health services with medical prison services.

A variety of prison health care models is preferred in Europe at the moment. All approaches cover prison mental health care as well, which in none of the countries included in these analyses is run

separately from general prison health care (see table 3). On a practical level, administrative models may differ. Where the Ministry of Justice is exclusively responsible for medical prison services, this responsibility usually covers only the health care staff or medical wards within a prison, while liaison physicians from the general health care system who may contribute to care for prisoners usually remain under the tutelage of the National Health Service. In the case of Cyprus, medical staff working exclusively in the national prison is nonetheless NHS-administrated.

Organisational Models of Prison Mental Health Care

No matter how the general responsibility for medical prison services is regulated in detail, most countries included in this study involve general psychiatric services in the care for prisoners. The contribution of external psychiatric services to prison mental health care is most often substantial. This applies particularly for psychiatric inpatient care, but it may also cover outpatient care to a considerable degree.
However, currently there are no exact data available to quantify the contribution of external services to both sectors. Instead, one must rely on estimates provided by experts collaborating in this study. To this end, global categories were chosen to classify collaboration models (see table 4).

Table 4: Organisation of Prison Mental Health Care

Internal *(exclusively by prison mental health care services)*	***External*** *(exclusively by external mental health care or NHS services)*	***Mixed*** *(by internal prison and external services)* ***internal services dominating***	***Mixed*** *(by internal prison and external services)* ***external services dominating***
Belgium	*England & Wales**	*Bulgaria*	*Austria*
Lithuania	*Cyprus*	*Czech Republic*	*Denmark*
	*Ireland**	*Finland*	*France*
	Norway	*Hungary*	*Germany*
		Italy	*Greece**
		The Netherlands	*Iceland**
		*Poland**	*Luxembourg*
		Portugal	*Slovenia**
			Spain
			*Sweden**

** England & Wales: First-level care is provided in prison by staff employed by the NHS, inpatient treatment by general psychiatric services.*
Greece: Due to a lack of data, it is unknown whether external or internal services dominate in the mixed care model.
Iceland: No medical prison wards are implemented.
Ireland: Mentally disordered prisoners are treated at Central Mental Hospital, which is a forensic psychiatric facility.
Poland: Apart from a few liaison contacts or emergency cases, mental health care is mostly internal.
Slovenia: Inpatient treatment is provided by general psychiatric services, outpatient treatment by general psychiatric services or by prison services.
Sweden: Outpatient treatment is provided in prison, inpatient treatment by general psychiatric services.

The terms “internal” or “external” (i.e., professionals from the NHS or the general mental health care system) refer to the respective system which professionals providing mental health care for prisoners may belong to or come from. The actual location of care, e.g., if prisoners are cared for on the prison premises (e.g., in medical prison wards) or outside the prison (e.g., in forensic hospitals, general psychiatric hospitals, or outpatient services) is considered secondary in this regard, as this may vary or depend on the severity of cases, the availability of beds, or other criteria. This aspect is outlined in table 5.

Table 4 suggests prison mental health care in Europe as provided by general psychiatry to a considerable degree. The majority of the included countries adopts an approach that mixes external with internal prison health services in varying proportions. Forensic psychiatry plays a role, too, although to a much lesser degree. England and Wales, Cyprus and Norway represent a cluster of countries preferring a clearly NHS-supported system of prison mental health care. Although categorised similarly to the aforementioned countries in table 4, Ireland favours a combined model of forensic and prison health care provision - most probably for pragmatic reasons, since all Irish mentally disordered offenders (whether or not they are forensic cases) are placed and treated in a centralised secured hospital. Belgium and Lithuania are protagonists of an internal prison mental health care model. To a certain extent, Italy and Poland might be added to this category, too. Apart from a few liaison contacts or emergency cases, most of Poland's prison mental health care is provided internally within the prison system.

The inclusion of general psychiatric services may be organised either by sending psychiatrists or other mental health care staff from the NHS to a prison ("come structure") or by referring prisoners to external services ("go structure"). Any such classification suffers from a lack of exact data that would allow one to quantify the actual numbers of liaison contacts of psychiatrists or referrals of prisoners to mental hospitals. So the overview in table 5 was based on estimations by the experts included in this study. The dominating "mixed" category in table 5 suggests that in most countries, it is most probably regional conditions or resources that determine routine practices.

Table 5: Integration of External Mental Health Care Services into Prison Health Care (estimated)

"Go structure" (referrals to external services)	*"Come structure" (visits of external staff in prison)*	*Mixed (come structure and go structure)*	*Not applicable (no external service usage)*
Denmark	*none*	*Austria*	*Belgium*
Italy		*Bulgaria*	*Lithuania*
Spain		*Czech Republic*	
		Cyprus	
		England & Wales	
		Finland	
		France	
		Germany	
		Greece	
		Hungary	
		Iceland	
		Ireland	
		Luxembourg	
		The Netherlands	
		Norway	
		Poland	
		Portugal	
		Slovenia	
		Sweden	

Legal Activities Regarding Prison Mental Health Care

In most countries, prison health care is the subject of ongoing legal change. Together with these changes, split responsibilities for prison health care (see table 3) add to rather complex legal frameworks that encompass a range of law books, legal instruments or codes. Additionally, each passing of

new prison laws or the adaptation of old regulations may potentially affect health conditions in prison, even if they do not directly aim at prison health or regulate prison health care.
To demonstrate the most recent developments in this area, table 6 lists selected legal activities from the included countries, as they were reported by the participating experts. This list is incomplete and legal categories or terms are not standardised. This selection does not suggest a distinct cross-national pattern for adapting the legal frameworks for prison mental health care to requirements of the routine practice. An analysis of the impact of specific national laws is beyond the objective of this report and must be the subject of detailed studies on a national level.

Table 6: Recent Legal Activities to Improve Prison Mental Health Care (selected)

Country	Year	Activity
Belgium	*2005*	*Legal Position of Detainees Act*
Cyprus	*2004*	*Implementation of a multidisciplinary team for prison health care*
Czech Republic	*1997*	*inclusion of NGOs into the care for detained substance abusers*
Denmark	*2000*	*Passing of "Enforcement of Sentences Act", stressing the equity of prison health care and general health care (including mental health care)*
England & Wales	*2002*	*National Health Service Reform and Health Care Professions Act (responsibility of prison health care transferred to NHS)*
France	*1994*	*General hospitals responsible for prison health care*
Finland	*2006*	*Passing of "New Prison Sentence Act" restructuring prison health services; since 1997 risk and needs assessment of prison inmates (OASYS) is implemented*
Hungary	*2003/2005*	*Regulation on the co-operation of Ministries of Justice and Health; regulation of Ministry of Health about quality assurance*
Ireland	*2006*	*Criminal Law (Insanity) Act 2006 clarifies admission and discharge to Central Mental Hospital*
Italy	*2000*	*Implementation of internal prison health care provision*
Lithuania	*1995-2005*	*Adaptation of the Law on Mental Health Care (equality of health care for prisoners); concept of drug abuse prevention and control in penal institutions; Implementation of suicide prevention program for 2003-2005*
Luxembourg	*2002*	*Co-operation with two external health services for providing health care to prisoners*
The Netherlands	*1998-2006*	*Implementation of "Penitentiaire Maatrege" (possibility of appeal against medical treatment); implementation of reducing recidivism program; restructuring of prison system is ongoing*
Poland	*2003*	*Ordinance of the Minister of Justice on the matter of detailed rules, extent and forms of prison medical units providing medical and psychiatric services to persons deprived of their liberty*
Portugal	*1991/1996*	*Implementation of two psychiatric clinics in prisons (1991); implementation of free drug sectors and therapeutic communities inside prisons (1996)*
Slovenia	*unknown*	*Implementation of prison health care provision by NHS*
Sweden	*1997*	*Responsibility for supervising health care in the prison system changed to The National Board of Health and Welfare*

List is incomplete. No major legal activities were reported from Austria, Germany, Greece, Iceland, Norway or Spain.