OFFICE FOR
COMBATING
DRUGS ABUSE

CROATIAN report

ON THE DRUG SITUATION 2010

European Monitoring Centre for Drugs and Drug Addiction

OFFICE FOR COMBATING DRUGS ABUSE

2010 NATIONAL REPORT (2009 data) TO THE EMCDDA by the Office for Combating Drugs Abuse of the Government of the Republic of Croatia

CROATIA

New Development, Trends and in-depth information on selected issues

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Drawn up on behalf of the Office for Combating Drugs Abuse of the Government of the Republic of Croatia and the European Monitoring Centre for Drugs and Drug Addiction (EMCDDA)

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The Office for Combating Drugs Abuse bears no responsibility for the validity of data derived by external sources, as well as for the consequences arising from their use.

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Summary

PART A: New developments and trends

Chapter 1. Drug policy: legislation, strategies and economic analysis

Although main concept of Croatian drug policy remained the same in 2009, the Act on Combating Drugs Abuse saw same changes in the sense of terminology and improving mechanisms for destruction of seized drugs as well as monitoring of legal flows of precursors. Based on the National Strategy on Combating Drugs Abuse 2006-2012 and its Action Plan on Combating Drugs Abuse 2009-2012, in the beginning of 2009 there was adopted Implementing Programme of the Action Plan on Combating Drugs Abuse for 2009. Main developments and activities were achieved in the field of prevention and social reintegration. Implementation of all measures and activities stated in the national strategic documents is regularly monitored and annually reported to the Croatian Parliament. The Government Commission on Combating Drugs Abuse met three times in 2009 to discuss emerging issues and to approve relevant documents. To confirm its commitment in formalising cooperation the EMCDDA, the Agreement between the European Union and the Republic of Croatia on participation of the Republic of Croatia in the work of the EMCDDA was initialled in December 2009.

Funds of the State Budget for suppressing drug related problems were in 2009 increased by 4%, which enabled on time implementation of main measures and activities set out in relevant national strategic documents. Additional positive information is that local governments managed to increase their budget for implementation of new County Action Plans on Combating Drugs Abuse 2009-2012, that were delivered in 2009. This is approve that national drugs policy started to be more effectively implemented at the local level which is essential for achieving long-term positive results.

Chapter 2. Drug use in the general population and specific targeted groups

In Croatia, there has been no general population survey on illicit drugs so far. However, in 2010 a feasibility study for the survey was carried out and a general population survey is planned for 2011. The European School Survey Project on Alcohol and Other Drugs (ESPAD) has been implemented in Croatia since 1995 (1995, 1999, 2003, 2007), and since the last ESPAD survey no other survey has been carried out on the national level. In 2009 there were several surveys on the use of drugs on the local level which show that more than 25% of pupils in secondary school smoke cigarettes regularly and that a great number of pupils find drugs readily available. This is especially worrying because drugs can be easily obtained around school, as well as in places where young people meet and spend their time.

From February to September 2009, the research Highly specific measurement of the quantities of illicit drugs in communal wastewater as the basis for determining the trend of drug abuse in Zagreb was carried out. This new approach in the estimation of drug abuse rests upon the analysis of drugs and their metabolites in communal wastewater and Zagreb became the fourth city (after London, Milano and Lugano) that conducted such a research project.

Chapter 3. Prevention

Office for Combating Drugs Abuse (OCDA) has, in cooperation with competent ministries and other competent administration bodies founded a Working Group for the Creation of the National Addiction Prevention Programme for Children and Youth in Educational Settings

and in Social Welfare System for the period 2010-2014, which was adopted by the Croatian Government in June 2010.

In 2009 there were many universal prevention activities, such as prevention programme Unplugged – preventing the use of tobacco, alcohol and other addictive substances (Imam stav in Croatian), which was created on the initiative of the European Union Drug Abuse Prevention (EUDAP). In Primorje – Gorski Kotar County, the Life Skills Training programme was continued and was adopted by some other counties (Varaždin County and Zadar County) and s an example of a good practice. In the family environment programmes mostly targeted parents (e.g. School of quality parenting in Pula), and as a good example of inter-sector cooperation is the programme "Together we can do more", which was implemented by the City of Zagreb in cooperation with the police and educational institutions in Zagreb for six consecutive years. Selective prevention mostly targeted children and youth (Small creative socialisation groups) and families (measure of supervision over parental care; Parents for parents) while indicated prevention activities continued to target youth that manifest risky behaviour (educational measure of intensified care and supervision).

Regarding the implementation of the National Campaign activities, the OCDA participated with EUR 15,713.

Chapter 4. Problem drug use

In 2009 national estimation of Problem drug users was done by mortality multiplier method like it was done in the previous years. Data for calculation were taken from the *General Mortality Registry* and the Registry of Treated Psychoactive Drug Abusers (CIPH). The benchmark was the number of the persons treated in 2009 defined according to EMCDDA definition of PDU. For 2009 central estimated number of problem drug users (PDU) in Croatia is 3145.

Chapter 5. Drug-related treatment: treatment demand and treatment availability

During 2009, 7 733 persons were treated within the health system, and the total number of the treated persons has not changed significantly in the last four years. Out of the total number of the treated persons, 6 251 (80.8%) of them were treated for opiate addiction, whereas 1 482 (19.2%) persons were treated for addiction to some other psychoactive substances. 921 (11.9%) persons were treated in inpatient treatment and 6 812 (88.1%) in outpatient treatment. The proportion of the treated men and women is 4.9:1, the same as in the previous year. Addict population in Croatia is getting older and for the first time the average age of treated addicts is 31.1.

The process of integration of the data on therapeutic community users into the health system is being carried out. In fact, the Ordinance on the type and scope of work of the social welfare home, the way of providing care outside their own family, conditions of the facility, equipment and employees in the social welfare home, therapeutic community, religious community, association and other legal entities as well as the centre for assistance and care at home (OG 64/2009) was adopted by the Minister of Health and Social Welfare.

Chapter 6. Health correlates and consequences

Risk behaviors of addicts, which most commonly include common use of needles, syringes and other equipment as well as risk sexual behavior, remain the biggest health risk for addicts in 2009. The number of Hepatitis B and C positive treated addicts is on the decline,

and share of addicts infected with Hepatitis C though still high, has also lowered. This is mainly due to extensive harm reduction programs and regular testing of addicts, with programs being implemented throughout the country, in cooperation with Croatian Red Cross and different NGOs. Also, a program was introduced into prison system that includes testing of all incoming prisoners, provision of precise information on HBV/HCV infection, administration of HBV vaccination and provision of therapy for infected inmates.

Since CNIPH started updating the data on death certificates in 1997 a continuous decline of the proportion of unknown causes of death, from 6% to 1%, is noticeable. In recent years, two new projects aimed at improving the quality of mortality data have been implemented in Croatia. The project "Quality Improvement of Mortality Statistics", implemented by the CNIPH, has been completed this year. The main objective was to make new regulations and the education of the coroners, so in 2007 and 2008 two propositions (on the Regulation on examination of the dead and determining the time and pattern of death and on the Regulation on a death certificate form) were put forward, but are not yet adopted. Besides that, the "Quality Improvement of Causes of Death Statistics", a project financed through European Union MB PHARE 2006, has also been completed and has produced a "Manual on filling in the death certificate" and "Instructions on filling in the medical part of a death certificate" leaflet for all appointed coroners on the territory of the Republic of Croatia, and a series of educational courses for coroners in Zagreb, Rijeka, Split and Osijek.

Chapter 7. Responses to health correlates and consequences

With the aim of reducing drug-induced deaths, in September 2009 pharmacotherapy with buprenorphin (Subutex) was replaced with buprenorphin-naloxon combination (Suboxon) for patients in substitution programmes. As in previous years, in treating psychiatric comorbidity, an attempt is made to treat both simultaneously.

In 2009 Croatian Red Cross, and NGOs Terra, Let, Help and Institut were active on a regular basis at different locations countrywide where harm reduction programmes were conducted. The Let organization started and implemented the initiative to create a network of organisations that conduct harm reduction programmes, and in 2009 "BENEFIT" organisation network was founded. In harm reduction programmes there were 4 877 persons included and the biggest number of persons, mostly males, was included in Croatian Red Cross and NGO Help. Large amount of equipment, mostly needles (636 303 pieces), syringes (289 759), condoms (43 587) and educational and informational material (21 575) was distributed and a total number of 241 136 needles and syringes were collected within the harm reduction programmes.

Chapter 8. Social correlates and social reintegration

Due to strong traditional family bounds and developed social infrastructure, Croatia still doesn't face homelessness in a proportion as some other European countries. Therefore, there is almost insignificant number of homeless addicts since majority of them still live with their primary family, and those in need can always refer to therapeutic communities or shelters. However, financial problems are quite common in population of drug addicts due to their expenses related to drug use and high unemployment rate, especially among opiate drug addicts which also have significant difficulties with education level.

Project of Social Integration of Drug Addicts that was adopted enables persons that completed their treatment or are being treated and are abstaining from drugs to continue education, change a profession, and get the employment and to successfully reintegrate into the society. For that purpose, all relevant institution at the state and local level engaged in a

join venture that in 2009 resulted with increased numbers of persons that were included in the available educational programmes and those who found employment. It has to be mentioned that these figures are not complete since many institutions haven't deliver dully filled in personal information form to UZDA, a database for monitoring implementation of the Project. As during last 3 years the Project was still in a pilot phase, all improvements, cooperation agreements and increased investments should in the forthcoming years result with higher figures. In addition to the interventions of public institutions in the frame of the Project of Social Integration of Drug Addicts, some therapeutic communities have counselling centres that provide different types of assistance before entering and after completing their rehabilitation programmes. Post-rehabilitation assistance, among others, provides assistance and advices in finding accommodation, job and realisation of other social and legal rights. Similar services are provided to drug addicted inmates which are prior and after their release included in the different programmes of prison and probation systems aiming at their social reintegration.

Chapter 9. Drug-related crime, prevention of drug related crime and prison

During 2009, Croatian police reported 7 063 criminal offences of narcotic drug abuse (10.4% less than in 2008), which makes 9.64% in the overall criminality on the territory of the Republic of Croatia. For narcotic drug abuse there were reported 5 019 persons, which is 3.9% less than in the previous reporting period (2008:5 679). In the same year there were 4 552 misdemeanour charges (2008:4 655) against 4 500 persons, which represents a 2.2% decline in the total number of misdemeanour charges compared to the year 2008.

According to the data of the State Attorney's Office, the number of the persons reported for criminal offences from the Article 173 of the Criminal Code was declining during the last 3 years. In the overall drug-related criminality, a criminal offence related to possession of narcotic drugs participated with 71.7%. Although the number of persons reported for more complex forms of this criminal offence was declining during the last five years, more significant decline was noted for the mildest form of narcotic drug abuse offence. In 2009, 2 790 adults were convicted for all modalities of narcotic drug abuse offence (12.3% less than in 2008), whereas it was 18% less all persons convicted if compared to 2008 (3.078:2.523). Minor offenders reported for narcotic drug abuse offence account for 5.8% in the total number of the reported minor offenders. As well as with adult offenders, a further decrease in juvenile drug-related crime has been noted among minors. Whereas in 2008 there were 218 reported minor offenders for narcotic drug abuse offences, during 2009 there were 206 (5.5% less) of them, 158 (76.7%) of which were minors reported for possession of narcotic drugs.

The number of drug addicted inmates (with or without the pronounced treatment measure) sentenced to imprisonment has been continuously increasing in the last 10 years, but in 2009 there was noted 18.9 % decline compared to the previous year. In 2009, as well as a year before, for the second time after 10 years it was recorded a decline in the number of addicts within the prison system, to whom a security measure related to obligatory treatment had not been previously pronounced (23.8 %).

Chapter 10. Drug markets

Availability of drugs from the national perspective can only be discussed in terms of ESPAD 2007 results since there were no new surveys in this area. According to the available indicators, there were also no significant changes in the Croatian drug market. Although cannabis is still the most widely available and abused drug, the mayor treat still represent heroin which is trafficked trough Croatia along the famous "Balkan route" and cocaine which is usually smuggled in the ship cargo and enters county through major sea ports. In 2009

there was recorded decline in the number of seizures (N=5 246), continuing negative trend that started in 2007, as well as in the seized quantities, with the exception of cannabis products. Street prices of cannabis resin, herbal cannabis and amphetamines increased, while in the case of cocaine average street price per gram was further decreased in 2009. It is clear that drug prices primarily depend on their availability, demand and quality. Purity of analysed seized drugs in Croatia was to the certain extent lower in 2009 compared to previous years and cocaine saw the largest decrease in quality.

PART B: Selected issues

Chapter 11. History, methods and implementation of national treatment guidelines

In Croatia there are two guidelines that refer to the treatment of drug addiction: the Guidelines for the Methadone Pharmacotherapy of Opiate Dependence and the Guidelines for the Buprenorphine Pharmacotherapy of Opiate Dependence. Both were adopted in 2006 and are targeting opiate addicts as the most significant and problematic group of drug users in Croatia. The main idea behind elaborating these guidelines was to provide professionals in the responsible inpatient and outpatient treatment settings with operational framework that would increase effectiveness of substitution treatment and would prevent possible abuse of medicines concerned. Both guidelines were elaborated by the expert group at the Ministry of Health and Social Welfare.

Chapter 12. Mortality related to drug use: a comprehensive approach and public health implications

In preparing Zagreb cohort mortality study the data for treated opiate drug abusers with the residence in the City of Zagreb during the seven years period were analyzed, between the January 1st 2000 and the December 31st 2006. Follow up period was extended for one year, up to 1st January 2008. in which the vital status of cohort participants was checked. During the study period 3 059 subjects were enrolled, out of whom 2 885 (94.3%) reached the end of the study. Males comprised 77.9% of the sample. Mean age of the enrollment in the cohort study was 27 years.

Cohort study analysis performed at the population of treated drug abusers in the City of Zagreb enables the insight in the population behavior and characteristics which might influence probability of survival in the respected period of time. Analysis indicated that type of treatment (in-patient or out-patient), living with other drug abusers had no influence on probability of dying earlier, but living conditions (alone/living with someone) have influence on probability of dying. Those who were living alone had higher death percentage. Age of the first use of opiates at the age range (15-24) had lower death rates from those above that age range. These findings are to be considered as relevant bases not only for further analysis of the determinants which might influence negative drug dependence outcomes, but for the development and implementation of the prevention programs and programs for youth at risk.

PART A

1 Drug policy: legislation, strategies and economic analysis

The Croatian drug policy was developed in mid 1990s to address both demand and supply of illicit drugs as well to mitigate harms of drug abuse. It was further developed in 2001 when Act on Combating Drugs Abuse was passed as a central legal act that regulates all aspects of drugs phenomenon and provides a base for operation of all relevant stakeholders in the national system. In order to ensure on time and effective implementation of drug policy, the Croatian Government set up the Committee for Combating Drugs Abuse whilst the Office on Combating Drugs Abuse (OCDA) was established to coordinate and monitor implementation of national activities. Based on current strategic documents, Croatia invests significantly in prevention and treatment of drug addicts but also in quite strict law enforcement.

1.1 Legal framework

As already described in the previous Reports, drug supply and demand reduction is regulated by relevant international and national instruments that are being continuously improved through the years in order to increase the effectiveness of responses in this area. To highlight, legal framework for combating drug abuse and illicit trafficking consists of following basic legal acts:

- Criminal Code[6], Chapter thirteen (XIII): Criminal offences against values protected by the international law, Article 173, covering illicit use (possession), production, trafficking, mediation in sale or purchase as well as any other type of trading in drugs. The Act also regulates the issue of guilt for the criminal offence committed under the influence of drugs
- Criminal Procedure Code[7]
- Act on Combating Drugs Abuse[8] as a central legal act that regulates all fundamental issues concerning drugs abuse

With a view to ensuring a more efficient fight against crime, especially the suppression of organised crime (including drug related crime) and corruption, the new Criminal Procedure Code (OG 152/08) was adopted. The Act entered into force on 1 January 2009, while with respect to the criminal offences within the competence of the Office for Suppression of Corruption and Organised Crime (USKOK)[9] it entered into force on 1 July 2009. With respect to other criminal cases, it will enter into force on 1 September 2011. The purpose of the new Act is to ensure more effective, faster and simpler actions in criminal proceedings, and to ensure alignment with the rules included in the Convention for the Protection of Human Rights and Fundamental Freedoms and with solutions prevailing in the countries of Europe. More specifically, the main features of the Act are: reform of the preliminary procedure - *court investigation has been abolished and prosecutor's investigation introduced*; introduction of new forms of accelerated procedure; improvement of procedural rules governing measures for efficient action. According to the new method of investigation, police officer is an *investigator* having a general competence for investigating

[6] Kazneni zakon Republike Hrvatske (NN 110/97, 129/00, 111/03, 105/04, 84/05, 71/06, 110/07, 152/08)
[7] Zakon o kaznenom postupku (NN 152/08; NN 76/09)
[8] Zakon o suzbijanju zlouporabe droga (NN 107/01, 87/02, 163/03, 141/04, 40/07, 149/09)
[9] The Office for Suppression of Corruption and Organised Crime (USKOK) was established in 2001 as an autonomous prosecution service attached to the State's Attorney Office with its central office in Zagreb. The USKOK has intelligence, investigative, prosecutorial and preventive functions and is responsible for international cooperation and exchange of information in complex investigations.

criminal offences. Police officers undertake inquest of criminal offences and emergency actions of collecting evidence by order and under direct guidance of a *state attorney*. Evidence collecting procedures in the course of investigation, which affect rights and freedoms of persons, are approved by an *investigating judge* at the proposal of a state attorney or a suspect.

With the introduction of new forms of expedited procedure in the regular (and shortened) procedure, the Act aims at achieving two key objectives. The first is relieving courts from trials on cases that can be resolved without a trial or with a trial only for ordering sanctions. With the appropriate application, significant acceleration can be expected in the procedure, as well as a reduction of the total number of trial hearings and long-term significant budget savings. The second purpose includes the courts concentration on cases that require trials due to their complexity. Moreover, there has been improvement in the area of procedural rules that regulate the measures for efficient action, such as measures for indemnity of the presence of the defendant and measures of procedural discipline.

During 2009, a number of ordinances necessary for the implementation of the new Criminal Procedure Code have been adopted:

- Ordinance on the execution of precautionary measures (OG 92/09)
- Ordinance on criminal records (OG 92/09)
- Ordinance on recording evidence collecting actions or other actions in pre-trial and criminal proceedings (OG 92/09)
- Ordinance on audio recording of a trial in the criminal proceeding (OG 82/09)
- Ordinance on the central register, investigative detention record and other registers held for detainees against whom investigative detention was ordered (OG 82/09)
- Ordinance on records of confirmed indictments (OG 82/09)
- Ordinance on conducting specific evidence collecting actions (OG 102/09)

In line with new provisions on criminal procedure, there was adopted the new State Attorney's Office Act (OG 76/09) and the USKOK Act (OG 76/09), which entered into force on 1 July 2009. According to the normative and implementation plan, more effective prosecution of the criminal offences of corruption and organised crime within the competence of USKOK will thus be enabled. The new Act on Police Activities and Powers (OG 76/09) was also adopted, which enables more effective implementation of the preliminary procedure and investigation, and at the same time requires significant funds for the additional training and intensified work of state attorneys.

With a view to achieving adequate preparations for work under the new Criminal Procedure Act, the State Attorney's Office of the Republic of Croatia, in co-operation with the Supreme Court of the Republic of Croatia and the Judicial Academy of the Ministry of Justice, organised a cycle of seven workshops which were attended by 42 state attorneys, 40 judges and 80 police officers who primarily work on cases within the competence of USKOK in the period from March to June 2009. In co-operation with the International Criminal Investigative Training Assistance Program (ICITAP), the State Attorney's Office of the Republic of Croatia conducted a seminar concerning cross-examinations for state attorneys in July 2009, while in September there was held an ICITAP workshop. Judges were also included in the programme.

In 2009, the system of specialised bodies aimed exclusively at the detection, prosecution and sanctioning of the criminal offences of organised crime was set up in full. Along with USKOK, in operation as of 2001, there is the National Police Office for the Suppression of Corruption and Organised Crime within the Ministry of Interior and special departments within county and municipal courts.

The Court Rules of Procedure (OG 116/08) were amended in September 2008 so that the criminal offences of organised crime might have priority in court. Accordingly, the amendments to the Court Rules of Procedure of October 2008 (OG 125/08) stipulated the establishment of special court departments for cases involving criminal offences within the jurisdiction of USKOK in the county and municipal courts in 4 largest Croatian cities/regional centres: Zagreb, Split, Rijeka and Osijek. The Act on USKOK and the Amendments to the Court Rules of Procedure served to set up special investigative departments for cases involving organised crime in the investigation centres of the previously mentioned county courts. The system of special court departments has been operating since 1 March 2009, when – after conducted security checks – *56 judges were appointed (County court in Zagreb – 23 judges, County court in Split – 11 judges, County court in Rijeka – 12 judges, County Court in Osijek – 10 judges).*

In the frame of restructuring of the criminal police, the National Police Office for the Suppression of Corruption and Organised Crime (PNUSKOK) became completely functional in February 2009. PNUSKOK monitors and analyzes trends and modus operandi of corruption and organized crime, directly conducts complex criminal investigations at the national level in collaboration with the USKOK, other state attorneys and competent bodies, supervises the implementation of complex criminal investigations in police administrations at the county level, defines working methods on the detection and combating crime, makes a proposal of priorities in the fight against the complex and organized crime, and keeps a collection of criminal records. PNUSKOK has four regional departments (Zagreb, Rijeka, Split and Osijek) and six specialised departments, one of which is dealing with drug related crime.

The whole new criminal procedure structure was introduced in this Report due to the fact that organised forms of drug related crime participate in quite significant proportion in all organised crime cases reported to USKOK (in 2008: 50% and in 2009: 36%).

As announced and partially already described in the last years' Report, *the Act on Combating Drugs Abuse* (OG 107/01, 163/03, 141/04, 40/07) was amended in December 2009 (OG 149/09). In the title and the entire text of the Act, words "narcotic drugs" were replaced by the word "drug". Furthermore, the Ministry of Health and Social Welfare took over responsibilities the Ministry of Economy, Labour and Entrepreneurship related to the control over trade in some precursors and gained central control over trade in all precursors. The amendments also shortened time limits for the destruction of seized drugs in order that drugs can be destroyed even after performing the necessary evidence procedures in cases when storage of drugs would be dangerous or associated with disproportionate difficulties. Otherwise, seized illicit drugs shall be destroyed after the legal validity of the verdict or the court decision and can be also destroyed 3 years after the submission of the criminal charge to the competent State Attorney's Office.

According to the provisions of the Act on Combating Drugs Abuse, the seized illicit drugs have to be destroyed in front of the *Committee for Destruction of Seized Illicit Drugs*, which was set up in November 2004 by the Government Decree. Members of the Committee are representatives of the Ministry of Health and Social Welfare, the Ministry of Internal Affairs, the Ministry of Economy, Labour and Entrepreneurship, the Ministry of Justice, the Ministry of Family, Veterans and Intergenerational Solidarity, the Croatian Journalists Association and the Office for Combating Drugs Abuse. During 2009, there were two incinerations (28 April 2009 and 23 November 2009) that took place in the authorised incinerating plant Našicecement dd, when more than 1 tonne of illicit drugs was destroyed (Table 1.1).

Table 1.1 – Overview of destroyed seized drugs (kg) in 2009

Type of drug (kg)	Date of incineration		Total (kg)
	28 April 2009	23 November 2009	
Cannabis products	377.883	471.662	849.545
Heroine	102.643	21.694	124.337
Cocaine	25.478	6.414	31.892
Amphetamine	7.226	2.082	9.308
MDMA	6.256	4.817	11.073
Methadone	0	0.477	0.477
Other	1.238	0.322	1.560
TOTAL (kg)	**520.724**	**507 468**	**1 028.192**

Source: Ministry of the Interior

Since the first incineration in January 2008 until the end of 2009, there were in total destroyed in Croatia approximately 4.8 tonnes of different illicit drugs.

In accordance to the Act on Combating Drugs Abuse, Article 2, paragraph 15, Minister of Health is in authority to set out a *List of drugs, psychotropic substances, plants used to produce drugs and substances that can be used in the production of drugs (precursors)*. The List is regularly updated in line with the relevant international and EU control regulations and national risk assessment procedure. In April 2009, the new revised List[10] (OG 50/09) was adopted, in which para-fluoroamphetamine was the latest new psychoactive substance that was put under legal control.

In previous Reports there were mentioned the *Amendments to the Act on Social Welfare*[11] *(OG 7/07)*, which enabled nongovernmental organizations and other relevant legal subjects to provide care and psycho-social treatment for drug addicts and drug users in the form of therapeutic community. According to the Article 105 of the amended Act on Social Welfare, Minister of Health and Social Welfare in June 2009 brought the *Ordinance on the type and scope of work of the social welfare home, the way of providing care outside their own family, conditions of the facility, equipment and employees in the social welfare home, therapeutic community, religious community, association and other legal entities as well as the centre for assistance and care at home* (OG 64/2009)[12]. Inter alia, this document regulates requirements in relation to the place and premises, equipment, professionals and other workers, methods of providing care and contains standards prescribed in the Guidelines for Therapeutic Communities.

As a part of preventive measures, during 2009 the Police continued to implement the Act on Road Traffic Safety[13]. Detailed information can be found in Chapter 9.3.

1.2 National action plan, strategy, evaluation and coordination

National action plan and/or strategy

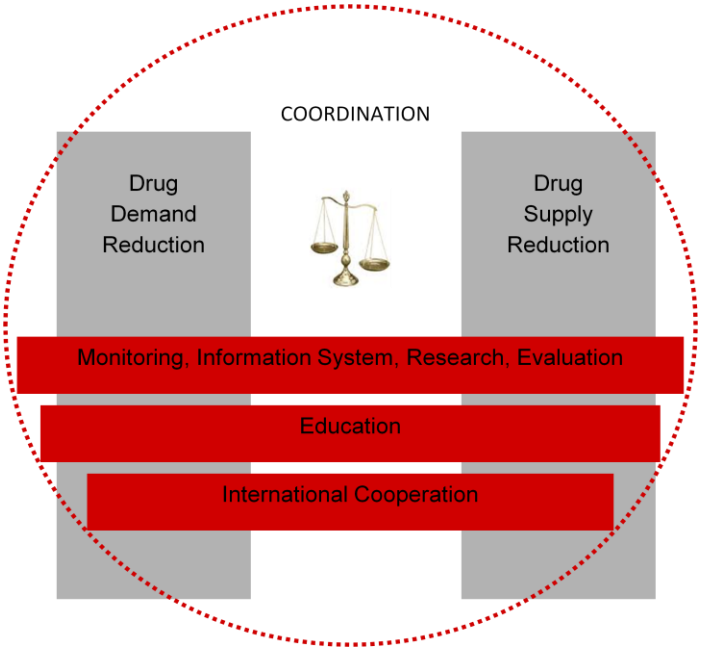
The Croatian Parliament adopted second national strategy on drug related issues in December 2005. The *National Strategy on Combating Narcotic Drug Abuse in the Republic*

[10] Popis opojnih droga, psihotropnih tvari i biljaka iz kojih se može dobiti opojna droga te tvari koje se mogu uporabiti za izradu opojnih droga (NN 50/09)
[11] Zakon o izmjenama i dopunama Zakona o socijalnoj skrbi (NN 7/07)
[12] Pravilnik o vrsti i djelatnosti doma socijalne skrbi, načinu pružanja skrbi izvan vlastite obitelji, uvjetima prostora, opreme i radnika doma socijalne skrbi, terapijske zajednice, vjerske zajednice, udruge i drugih pravnih osoba te centra za pomoć i njegu u kući (NN 64/09)
[13] Zakon o sigurnosti prometa na cestama (NN 67/08)

of Croatia for the period 2006-2012[14] (National Strategy) advocates an integrated, multidisciplinary and balanced approach to tackling drugs phenomenon and lies on 6 main pillars:

- Coordination;
- Drug demand reduction;
- Drug supply reduction;
- Monitoring, information system, research work and evaluation;
- Education;
- International cooperation.

Picture 1.1 – Structure of the National Strategy on Combating Narcotic Drug Abuse in the Republic of Croatia



Source: Office for Combating Drugs Abuse

This main strategic document is being implemented through two triennial *Action Plans on Combating Drugs Abuse in the Republic of Croatia* (Action Plan). Based on the proposals of relevant state authorities and according to their competence in the field of drugs, there was produced the second Action Plan for the period 2009-2012 (valid from 1 January 2009 until 31 December 2011), which was adopted by the Government of the Republic of Croatia in February 2009. The Action Plan continues to reflect all key issues set out it the National Strategy, describing specific aims that are to be achieved in the forthcoming period together with the methods for achieving stipulated goals, as well as specific tasks of particular responsible stakeholders for the certain budget period, all based on the assessment of the previous Action Plan and new needs from the professional point of view. The main objective of this Action Plan is to ensure responsibility for the implementation of the national policy for suppression of drug addiction and to enable the establishment of a multidisciplinary, integrated and effective approach to the combating drugs abuse at national and local level. Furthermore, the Action Plan has the following special goals:

- To improve coordination and cooperation by and between state administration bodies, by and between state administration bodies and local (regional) self-government, and by and between state institutions and civil society organisations.
- To set up and improve the network of institutions for combating addiction at state and local level.

[14] Nacionalna strategija suzbijanja zlouporabe opojnih droga u Republici Hrvatskoj (NN 147/05)

- To improve prevention-oriented programmes for children and young people, and to advance the educational role of schools with a view to preventing addiction.
- To develop and implement special prevention programmes for groups at risk.
- To strengthen the measures of student, parent and teacher education concerning the harmfulness and impact of drugs and other addictive substances, and to implement prevention programmes against drug addiction jointly with prevention programmes for alcohol, cigarettes and other substances.
- To create prevention programmes for younger age groups from 4 to 10, and to include them in educational institutions.
- To improve measures concerning therapy, treatment and social reintegration of addicts and accordingly to set up multidisciplinary teams for work with addicts and their families.
- To establish better cooperation with institutions at local level in order to create a connection between various phases of therapy and early detection, detoxification, selection of adequate form of treatment and social reintegration.
- To strengthen the measures of the repressive apparatus in the prevention of drug availability and the suppression of drugs abuse, and to improve the penal policy in the field of suppressing drugs abuse and organised crime.
- To encourage, implement and financially support scientific research of the problem of addiction.
- To allocate significant financial resources for the implementation of the programmes at state level and to set up professional teams in state institutions to work on the implementation of all measures included in the Action Plan.
- To implement the Action Plan as a long-term, planned and ongoing activity, and not as occasional projects and campaigns.

All responsible state authorities, public institutions, local/regional authorities and nongovernmental organizations are obliged to implement concrete measures and activities in the given timeframe. More specifically, the Action Plan foresees 33 measures and 179 activities that distributed within 7 components: coordination, research and information system, drug demand reduction (prevention, medical and social treatment, harm reduction, social reintegration), drug supply reduction (suppression of drug-related crime, control of precursors, treatment of drug addicts in the penal system), international cooperation, evaluation and education. Financial resources needed for the implementation of the Action Plan in 2009 were ensured from the State Budget at the position of specific ministries in the total amount of EUR 12.025,879. For 2010 and 2011, there was made an assessment of the financial resources that will have to be ensured at the position of specific ministries and other relevant state bodies for the implementation of the measures included in the Action Plan (estimation for 2010 = EUR 12.123,150 and estimation for 2011 = EUR 13.228,796).

As one of the most important principles of the National Strategy, the principle of decentralization enables application of national drugs policy at the local level and guarantees the same degree of availability of different programmes countrywide, in accordance with the specific needs of individual local communities (i.e. counties). Therefore, in order to translate national drug policy into the local level, the *County Action Plans on Combating Drugs Abuse 2009-2012* (County Action Plans) were adopted in March 2009. First County Action Plans were produced 2006, which resulted with improved coordination and implementation of measures and activities in the targeted area at the local self-governing level.

The Action Plan is further elaborated on annual basis in the form of the implementing programme. Pursuant to the mentioned above, in March 2009, the Government Committee for Combating Drugs Abuse adopted the *Implementing Programme of the Action Plan on Combating Drugs Abuse in the Republic of Croatia for 2009*, that stipulates measures and activities of competent stakeholders to be implemented in the course of 2009.

Implementation and evaluation of national action plan and/or strategy

Since national strategic documents on drugs are very comprehensive and detailed, only mayor developments and activities are described in this Report. The most important novelty is the *National Addiction Prevention Programme for Children and Youth in Educational Settings and in Social Welfare System for the period 2010-2014*, which is detailed in Chapter 3. Drafting of the programme began in October 2009 but it was finalised and adopted only in mid 2010. Following recent trends, this programme is the first Croatian document which unifies all preventive strategies related to different types of addiction and the most probably, it presents the first step towards integrated policy on addictions (drugs, alcohol, tobacco, betting, Internet, video games, etc.).

As a continuation of prevention activities launched under the CARDS 2004 twinning project which ended in February 2008, we continued to educate professionals in new preventive methods/skills (MOVE - Motivational Intervention for Youth at Risk[15]). In June 2009, it was held supervision seminar for 12 professionals, previously trained in the course of 2007 and 2008, where they became licensed trainers for further implementation of MOVE educations.

Following the example of previous years, in 2009 there was also conducted the National Media Campaign[16] which aimed to more effectively educate children, youth and the general public about the harmful effect of drugs in order to change youth attitudes on drugs, to raise public awareness of the expanse and serious dimensions of the drug addiction problem and to include the larger number of citizens and institutions in the fight against addiction. The additional justification for such media campaigns is to increase the visibility of responsible institutions and transparency of their work. In order to strengthen cooperation with media and to ensure objective reporting on drug related issues in the Republic of Croatia, the OCDA in cooperation with Croatian Journalists Association and Assembly of Court Reporters organised two-day seminar for journalists which in written or electronic media report on drugs (March 2009). The participants were acquainted with the new developments in the area of combating drug abuse, new trends in drug markets and drug related crime and criminal justice aspects. There were discussed role of public media in promotion of prevention and treatment of drug addiction and modalities of future cooperation and communication together with the development of mutual trust.

As one of the most important national projects, the *Project of Social Reintegration of Drug Addicts*[17] continued to be supported by the Croatian Government in 2009. This project targets drug addicts who completed a rehabilitation and detoxification programme in a therapeutic community or prison, and addicts undergoing treatment outside the hospital, which are successfully abstaining from drugs for a longer period of time and complying with the prescribed therapy. Part of the measures refers to professional orientation of clients whilst the other part present measures to encourage employment. More details on this project are available in the Chapter 8.

Due to the global dimension of drugs phenomenon, efficient drug policy implies also international and especially regional cooperation. In 2009, Croatia actively cooperated with all relevant European and international organizations and continued bilateral cooperation arrangements with numerous countries. However, top priority in international relations was cooperation with the European Monitoring Centre for Drugs and Drug Addiction (EMCDDA), the Agreement between the Republic of Croatia and the European Community on the participation of the Republic of Croatia in the work of the EMCDDA (Agreement) was initialled in Brussels on 6 July 2009. However, on 16 December 2009 the Mission of the

[15] More information can be found in the Chapter 3.3
[16] More information can be found in the Chapter 3.4
[17] More information can be found in the Chapter 8.2

Republic of Croatia to the European Union received a letter from the Director-General of the Directorate-General for Justice, Freedom and Security of the European Committee (DG JLS) requiring that in the text of the Agreement the provisions of the Lisbon Treaty, which entered into force on 1 December 2009, should be taken into account. Therefore, on 22 December 2009 the revised text of the Agreement was initialled, in which the term *European Community* was replaced with the term *European Union*.

Further development of National drugs information system is strongly supported by the Croatian Government and the Croatian Parliament. In 2009, Deputy Prime Minister, 4 members of the Croatian Parliament, members of the Advisory Board at the OCDA and 2 representatives of the OCDA (which in hosting Croatian Focal Point for Reitox) visited EMCDDA. In December 2009, there was drafted second *Action Plan on National Drug Information System in the Republic of Croatia* for the period 2010-2011. Since it was adopted only in 2010, more detailed information will be available in following reports.

Evaluation

National Strategy and its Action Plan for the given period are being evaluated annually on the basis of various (standardizes and non-standardized) reports of responsible ministries, institutions and civil society organizations. More specifically, the Action Plan is very concrete document, specifying individual measures/actions, institutions in charge for the implementation of each measure/action and deadlines for their implementation. Therefore, responsible institutions are obliged to deliver report on the progress made in the given period to the OCDA which then analyses all the reports and asses general progress in the implementation of strategic documents. In that sense we can say that the OCDA, which is as national coordinator in charge also for monitoring implementation of those documents, is providing process evaluation. Based on different indicators, the OCDA annually monitors trends and depending on the findings/situation proposes additional measures or even changes of the foreseen measures in the given period, if required. The findings are summarised in the annual national report on implementation of national strategic documents, which is presented to the Croatian Parliament.

Individual programs can be evaluated by implementing institution, contractor or external evaluators. Programs in the drug demand reduction area that are being implemented at the local level are often evaluated by County Committees on Combating Drugs Abuse (internally or externally) since they finance such programs. At the national level, programs of civil society organizations are evaluated by external evaluators since serious financial resources are being allocated for their implementation from the State Budget.

However, the evaluation is still quite poorly represented in Croatia. In order to promote evaluation of preventive projects, a multi professional expert team has developed Professional and Scientific Principles and Standards for Evaluation, which are published as a special appendix[18] to the National Addiction Prevention Programme for Children and Youth in Educational Settings and in Social Welfare System for the period 2010-2014. During the promotion of this programme in the counties, there were organised lectures and discussions on the professional and scientific principles and standards for evaluation in order to raise the awareness on the importance of the evaluation among the professionals that develop and/or implement prevention projects.

[18] OCDA (Office for Combating Drugs Abuse of the Government of the Republic of Croatia) (2010). National Addiction Prevention Programme for Children and Youth in Educational Settings and in Social Welfare System for the period 2010-2014. pp 53-60. OCDA, Zagreb. (Document is available only in Croatian.)

Coordination arrangements

Coordination by and between all bodies involved in the fight against drugs phenomenon at all levels of state authorities is essential to ensure integrated implementation of the national policy for the suppression of drugs abuse, which requires a balanced, multidisciplinary and integrated approach. As stipulated in the National Strategy, coordination should not entail the takeover of responsibilities for the implementation of activities within the competence of other competent authorities, but should ensure that measures and activities are implemented consistently, timely and effectively with a view to merging the system for the suppression of drugs abuse into a single whole. Each of the stakeholders in the system concerned at national and local level is responsible for the implementation of measures within its authority, but should also be responsible for the results achieved through such measures. The role of coordination in such a complex process is to direct subjects involved in the implementation of measures for the suppression of drugs abuse towards the goals laid down in the strategic documents, but at the same time to point to deficiencies in their implementation.

At national level, there are two bodies in charge of coordination. The first one is the *Committee for Combating Drugs Abuse of the Government of the Republic of Croatia* (Government Committee) and the other is the *Office for Combating Drugs Abuse of the Government of the Republic of Croatia*. The task of the Government Committee is to create national drug policy and to coordinate activities of the ministries and other subjects responsible for the implementation of drug policy on the high level, as well as to adopt implementing programmes of the relevant ministries and state administration organisations. Deputy Prime Minister of the Croatian Government in charge of social issues, convened three sessions of the Committee in 2009. The most relevant discussion points referred to adoption of strategic documents and reports as well as to the new policy developments. As the main outcomes, there should be reported adoption of the afore mentioned Action Plan and its implementing programme for 2009, and reports on the implementation of key national projects and activities. The Committee also supported amendments to the Law on Combating Drugs Abuse. During one of the sessions, the Ministry of Science, Education and Sports was strongly recommended to reinforce implementation of school preventive programmes in educational settings. However, the most important conclusion of the Committee in 2009 is the need for an initiative that would enable implementation of integrated national policy on psychoactive substances. Besides alcohol, tobacco, drugs and doping substances, this new concept would also cover some other modern addiction e.g. video games and Internet. If accepted, this proposal could in the near future trigger wide range of discussions and would require significant changes of the existing national system. There were also discussed possibilities o initiating wider scientific and professional discussion on criminal and misdemeanour responsibility for possession of drugs for personal use.

The task of the OCDA is to provide systematic monitoring of the implementation of the National Strategy and the Action Plan, which takes place through coordinative work and cooperation with the ministries, state administration bodies at national and local level and cooperation with civil society organisations. Therefore, the role of the OCDA as the national coordinator in the implementation of the national drug policy is to conduct continued coordination to ensure that the implementing measures are appropriately and effectively streamlined between the state administration bodies, other institutions and local self-government. At the OCDA, there is an expert body called *Advisory Board*, consisting of a president and ten members which are on the proposal of Head of the OCDA appointed by the Croatian Government. Upon the decision of Head of OCDA, in 2009 there was appointed new Advisory Board which now make experts and professionals in the field of prevention, education, public health, treatment, legislation, law enforcement, representatives of non-governmental organizations and media. In 2009, there were 3 meetings of the Advisory Board. They discussed treatment of opiate addiction as opiates are the most prevalent drug

among clients in the treatment. Since Subutex indicated high potential for abuse, the Advisory Board recommended introduction of Subuxon which is also used in most European countries. For the purpose of scientifically based interpretation of drug related deaths in Croatia, there was supported setting up of the Special Mortality Register. Furthermore, in order to have better overview of public expenditures in relation to the implementation of national strategic documents on drugs and to harmonise reporting, all relevant ministries were asked to deliver separate budget report containing information on costs of specific drug related activities and programmes together with the estimate of funds spent on combating drugs in the frame of regular activities and general programmes. There was also supported update of the Project of Social Reintegration of Drug Addicts which refers to the procedure for completing secondary education after completing treatment in the therapeutic community or after release from prison. The Advisory Board also participated in elaboration of the National Addiction Prevention Programme for Children and Youth in Educational Settings and in Social Welfare System for the period 2010-2014, giving its recommendations and guidance. It was also encouraged more proactive cooperation of the OCDA with public media, not only to provide reliable information on drugs, drug situation and new policy developments, but also to present its major activities. In addition, due to the fact that public media occasionally release information on drugs in a way that promotes its use, it was concluded that the OCDA should publicly respond on every case of “advertising”. The Advisory Board also commended efforts of the OCDA in fostering cooperation with and between all responsible institutions at the national and local level, coordinating implementation of strategy papers, monitoring drugs situation, improvement of legislative framework and proposing measures for further development of the system on combating drug related problems.

County Committees on Combating Drugs Abuse (County Committees) act as drug coordinators at local and regional self-government level. Their main task is to develop networks of various programmes at county and local self-government level and to coordinate activities in the field of drug abuse with state-level measures to achieve the principal goals of the National Strategy, reducing the offer and reducing the demand for drugs. As it is essential to have stabile, continued and intensive cooperation between national and local level, in the course of 2009, the OCDA participated at regular session of County Committees in order to discuss cooperation models and implementation of local strategic documents. It also organised annual coordination meeting with presidents of County Committees where it was presented new Action Plan and discussed elaboration of County Action Plans for the period 2009-2012. Representatives of the County Committees participated also in different activities organised by the OCDA, e.g. seminars, study visit to Germany. Since during last few years there has been noticed significant progress in decentralized approach to tackling drug related problem in the counties/local communities, Croatia will continue to invest in the further development of local initiatives.

A significant attention was paid on improvement of cooperation with the non-governmental organizations (NGOs) as equal partners. In the first months of 2009, a number of civil society programmes were financed by different state authorities (e.g. OCDA, Government Office for Associations, Ministry of Health and Social Welfare). The OCDA every year sets a priority area for providing financial support to relevant NGOs in the given year. Since the priority areas of the tender for awarding financial support to the project activities of the NGOs in 2009 were prevention and social reintegration, the OCDA funded 27 projects with the total amount of EUR 135,135. The OCDA organized several coordination meetings with representatives of therapeutic communities and associations with the objective to discuss state of play in the implementation of standards for therapeutic communities (described in the previous Reports), topics of future educations, format of their activity and financial report, as well as to jointly define priority areas to be financed in 2010. They also participated at different educations, among which the most important one is related to the implementation of the afore mentioned Ordinance on the type and scope of work of the social welfare home,

the way of providing care outside their own family, conditions of the facility, equipment and employees in the social welfare home, therapeutic community, religious community, association and other legal entities as well as the centre for assistance and care at home.

1.3 Economic analysis

The OCDA is on annual basis collecting information from responsible ministries on financial assets spent in the previous year for the purpose of national reporting to the Government of the Republic of Croatia and the Croatian Parliament on the implementation of the relevant national strategic documents. In the State Budget of the Republic of Croatia each public administration authority has a specific budget line which is divided into items and the activities according to their scope of work and responsibilities. Similar to the previous years some ministries had difficulties to trace back real costs related to the implementation of the drug policy in their scope of responsibility. Unfortunately, due to lack of financial resources, survey on "Methodological basis, components and empirical review of monitoring, analysis and reporting models on effectiveness of national drug abuse suppression mechanisms in Croatia" which was mentioned in the previous, hasn't been conducted yet.

Table 1.2 – Labelled drug related expenditures in Croatia according to responsible institutions (2008 and 2009)

STATE INSTITUTION	LABELLED EXPENDITURES (EUR)	
	2008	2009
Office for Combating Drugs Abuse	857,568	567,928
Ministry of Science, Education and Sports	1.218,887	741,900
Ministry of Family, Veterans' Affairs and Intergenerational Solidarity	1.040,595	1.081,105
Ministry of Health and Social Welfare (including Croatian Institute for Health Insurance)	4.290,003	5.100,694
Ministry of the Interior	3.794,546	3.549,396
Ministry of Finance – Customs Administration	51,351	-
Ministry of Foreign Affairs and European Integration	6,757	6,757
Ministry of Justice	49,595	683,721
Ministry of Economy, Labour and Entrepreneurship	56,485	84,416
TOTAL	**11.365,787**	**11.815,917**

Source: Report on the Implementation of the National Strategy on Combating Drugs Abuse in the Republic of Croatia for 2009

Following the available data that have been delivered to the OCDA by the relevant ministries for the year 2009, in the State Budget it was in total spent EUR 11.815,917 which is 4% more that in the 2008 when the implementation of national strategies amounted EUR 11.365.787[19].

In the State Budget for 2009, the total budget line of the OCDA amounted EUR 567,928. Out of the afore mentioned total expenditure, the major proportion of the budget was distributed among nongovernmental organizations for financing implementation of different programs. In 2009, the OCDA invited tenders for prevention and social reintegration programmes which were set out as priority area for this year. Accordingly, OCDA financially supported 27 non-governmental organizations in the total amount of EUR 135,135. All prevention activities were in total financed with EUR 102,095 (tender and other support), for programmes of the therapeutic communities it was spent EUR 22,973 and for social reintegration EUR 75,153. For organizing different educational programs it was spent EUR 15,713 while for the national media campaign OCDA contributed with the EUR 59,441. Continuation of the "Anti-drugs phone" project, as free of charge counselling and information service for the citizens, cost EUR 18,054.

From the budget line of the Ministry of Family, Veterans' Affairs and Intergenerational Solidarity there was in total spent EUR 1.081,105 for the implementation of activities and measures of the programs foreseen in the national strategic documents. This Ministry is also regularly financing activities of the civil society, specifically organizations active in the field of drug addiction prevention and different aspects of providing help to drug users. In this aspect it is important to differentiate two main financial sources of the Ministry of Family, Veterans' Affairs and Intergenerational Solidarity. Therefore, for the civil society projects related to the combating drugs and other forms of addiction it was allocated EUR 785,909 from the part of the Lottery Fund, whilst from the regular budget of the Ministry there were financed activities Clubs run by civil society organizations that are dealing with addiction prevention, education and organizing leisure time activities in the amount of EUR 135,135. Regional Info Centres for Youth were supported with EUR 59,459. For strengthening the role in the prevention though the implementation of successful parenting projects there were financed 10 projects in the amount of EUR 91,216. On the media campaigns it was in total spent EUR 9,386.

During the 2009, the Ministry of Health and Social Welfare financed implementation of activities and measures stipulated in the implementing programs of the National Strategy and the Action in the amount of EUR 3.073,667. It has to be clarified that similar to the Ministry of Family, Veterans' Affairs and Intergenerational Solidarity, the Ministry of Health and Social Welfare also disposes with a part of the Lottery Fund in line with the provisions of the Regulation on criteria for determination of beneficiaries and distribution means for part of the proceeds obtained from games of chance (OG 187/04). The Croatian Institute for Health Insurance provided additional EUR 2.027,027 for activities of the Services for mental health and addiction prevention. All together, both institutions in 2009 provided EUR 5.100,694 for prevention and health care activities. If we look more detailed at the budget of the Ministry (EUR 3.073,667), more than half or EUR 1.865,135 was given to the Services for mental health and addiction prevention which in total received EUR 3.892,162. For the programs aiming at the risk prevention as well as the psychosocial support for the behaviour disorders, nongovernmental organizations received EUR 270,270 for 39 different projects. From the regular budget of the ministry, there were also co-financed other non-governmental projects that contribute to demand reduction activities in less significant amounts. Harm reduction programmes were co-financed with EUR 518,532.

[19] Since the amounts are expressed in Euros, there can be noticed a difference between figures that are specified in 2009 and in 2010 National Report, which occurred due to different exchange rate (14 October 2009: 1 Euro = 7.25 Kunas; 27 January 2011: 1 Euro = 7,4 Kunas). Corrections were made in order to enable comparison between years. This applies to the whole subchapter.

Prevention activities in the educational settings countrywide were supported by the Ministry of Science, Education and Sports in the amount of EUR 741,900.

In the supply reduction area the main financial commitment comes from the Ministry of the Interior which in 2009 spent EUR 3.549,396 for the implementation of the range of activities and drug supply reduction measures as stipulated in the national strategic documents and plans. Customs Administration of the Ministry of Finance shares a part of the responsibilities in the drug supply reduction but in 2009 it was not specified separated budget line for combating drug abuse.

The Ministry of Foreign Affairs and the European Integration also specified amount for their involvement in the drug related activities – EUR 6,757.

In 2009, budget of the Ministry of Justice significantly increased to EUR 683,721, if compared to previous year (EUR 49,595). The main reason of such increase is the fact that only in 2009 Ministry of Justice introduced new position in its general budget, which relates to the treatment of drug addicts in the prison settings.

As the Ministry of Economy, Labour and Entrepreneurship continued with the activities defined in the Project of Social Reintegration of Drugs Addicts, on professional orientation of clients and measures to encourage employment there was totally spent EUR 84,416.

Ministry of Defence is strongly involved in the implementation of the national drug policy and is important and active partner in the implementation of activities defined by the National Strategy and the Action Plan. Thus, it is not possible to specify financial resources for the implementation of drug related activities of the Ministry of Defence since such activities are not visible in their budget structure.

Table 1.3 - Labelled drug related expenditures in Croatia by counties (2008 and 2009)

COUNTY	LABELLED EXPENDITURES (EUR)	
	2008	2009
City Zagreb	130,006	41,800
Zagreb County	36,486	88,690
Krapina- Zagorje County	14,253	20,716
Sisak – Moslavina County	33,783	13,486
Karlovac County	2,702	8,392
Varaždin County	29,729	18,445
Koprivnica – Križevci County	32,432	30,675
Bjelovar – Bilogora County	0	6,756
Primorje – Gorski Kotar County	189,594	216,216
Lika – Senj County	4,459	59,655
Virovitica – Podravina County	18,243	16,216
Požega – Slavonia County	2,702	2,972

Brod – Posavina County	6,756	8,108
Zadar County	183,297	178,378
Osijek – Baranja County	33,783	67,567
Šibenik – Knin County	5,405	38,513
Vukovar – Sirmium County	30,405	6,756
Split – Dalmatia County	277,272	457,645
Istria County	147,862	286,507
Dubrovnik – Neretva County	21,891	37,837
Međimurje County	4,729	13,851
TOTAL	**1.205,79**	**1.619,18**

Source: Report on the Implementation of the National Strategy on Combating Drugs Abuse in the Republic of Croatia for 2009

According to the principal of shared responsibility between the state and the local community, the resources for the actions of the county committees for the suppression of drugs abuse, implementation of preventive measures on the local level and other activities whose quality implementation depends on the initiatives of the local government, are allocated from the budget resources of the bodies of local self-government. During 2009, counties provided EUR 1.619,189 for the implementation of the County Action Plans which is 34% more if compared to previous year. This positive trend proves more active role of counties in developing and implementing local drug policy, in particularly County Action Plans, which influences on budgetary discharge at the state level.

Split – Dalmatia County, Istria County, Primorje – Gorski Kotar County and Zadar County took lead in funds which County Budget provided primarily for preventive activities but also for other projects related to suppression of drug-related problems. Majority of counties with the rate of drug addicts per 100,000 inhabitants higher than the Croatian average (e.g. Istria County: 572,7; Zadar County: 517,2; City of Zagreb: 420,9; Dubrovnik-Neretva County:381,2; Šibenik-Knin County: 347,0; Split – Dalmatia County: 330,7 and Primorje – Gorski Kotar County: 308,2), spent quite higher amounts on tackling drug related problems in relation to those with lower rates. There are a few counties with the lower rate which also allocated significant funds for the implementation of County Action Plans: e.g. Osijek – Baranja County and Zagreb County.

Table 1.4 - Labelled drug related expenditures in Croatia by area of activities (2008 and 2009)

AREA OF ACTIVITY	LABELLED EXPENDITURES (EUR)
Prevention programs	2.129,145
Outpatient treatment programs	3.892,162
Drug-free residential treatment programs*	804,537
Treatment in prison settings	683,721

Harm Reduction	518,532
Social Reintegration programs	226,257
Law Enforcement activities	3.549,396

* refers only to the programs of social institutions, so-called Homes for Addicts
Source: Report on the Implementation of the National Strategy on Combating Drugs Abuse in the Republic of Croatia for 2009

If we compare drug related expenditures in the specific areas of combating drug related problems, from the information available it is visible that in 2009 at the central level it was allocated EUR 2.129,145 for the prevention programs, which is 12.8% less than in 2008. Since it is still not possible to precise costs of overall residential treatment in the country due to lack of information from the general health system, in the Table 1.4 there is available only information on support given to Home for Addicts, former non-governmental organizations dealing with rehabilitation of drug addicts which have reached programme standards of the Ministry of Health and Social Welfare and are now being regularly financed as social institutions. When it comes to the treatment of drug addicts within the health system, there are available figures only related to the outpatient treatment. The network of Services for Mental Health and Addiction Prevention[20], which besides activities related to addiction prevention also provide outpatient treatment of drug users, continued to be financed by the Ministry of Health and Social Welfare for the implementation of their work programs, while the Croatian Institute for Health Insurance and local government are responsible for the administrative and basic operational costs. Since information on contribution to the outpatient treatment system from the local government is not available, real total expenditures can't be properly calculated. Similar as previous years, there are available only data from the Ministry of Health and Social Welfare and Croatian Institute for Health Insurance according to which for the outpatient treatment it was spent EUR 3.892,162, which is almost 80% more than in 2007. This information firmly proves that Croatian drug policy is strongly supporting outpatient orientation of drug addiction treatment. As already mentioned in the previous sub-chapter, the national Project of Social Reintegration of Drugs Addicts[21] continued to be implemented during 2009. During the reporting period, the State Budget spent in total EUR 226,257 for the implementation of the afore mentioned project.

In drug supply reduction area there are still available only general information on drug-related expenditures, without breakdown according to the specific activities and budget items. In 2009, for the drug supply reduction measures undertaken by the authorized law enforcement agencies in the State Budget it was allocated EUR 3.549,396, all on the position of the Ministry of the Interior. As already mentioned, although Customs Administration of the Ministry of Finance shares a part of the responsibilities in the drug supply reduction, they were not able to distinguish costs of those activities in their budget for 2009.

The data available shows that the national drugs policy invests significantly more in drug demand reduction programs. For the demand reduction filed the state authorities have provided financial support in the value of EUR 8.254,354 compared to EUR 3.861,718 for the law enforcement activities. Thus, one has to be careful when comparing those figures in law enforcement data are not complete since data from Customs Administration are not available. If there would have been available more detailed figures of the local level, the estimated public expenditures related to prevention and programs aimed at providing the

[20] Former Services for Prevention and Outpatient Treatment.
[21] Institutions responsible for the implementation of the Project of Social Reintegration of Drug Addicts at the national level: Office for Combating Drugs Abuse, Ministry of Health and Social Welfare, Ministry of Science, Education and Sports, Ministry of Economy, Labour and Entrepreneurship, Ministry of Justice and Croatian Employment Service, non-governmental organizations.

assistance to drug users would prove that public health interests have a crucial role in tackling drugs phenomenon in Croatia.

In order to improve economic analysis for the purpose of national reporting to the EMCDDA but also to the national authorities, the OCDA notified in its Report on the Implementation of the National Strategy on Combating Drugs Abuse in the Republic of Croatia for 2008, that public administration should urgently restructure their financial evidences in a way that would enable more detailed insight in drug-related public expenditures.

To conclude, total funds spent in the State Budget and the County Budgets amount EUR 13.435,107, which is 6,8% more than in 2008 when implementation of National Strategy and Action Plan at national and at local level cost EUR 12.571,588. Analysis of the funds spent by individual stakeholders shows that the largest amount of funding was provided and spent by the Ministry of Health and Social Welfare and the Ministry of Interior, similar like previous years. Some stakeholders still do not have special budget line or specific financial means for implementation of drug related activities, which are in such case financed from their funds for regular activities. Therefore it is not possible to provide comprehensive, solid and objective overview of drug related public expenditures related.

Therefore, in order to harmonize the methodology of collecting data for economic analysis, in the forthcoming period all ministries will have to divide their budget lines and to clearly show funds that were in their budget lines dedicated for implementation of drug supply or demand reduction programmes (prevention, treatment, social reintegration etc.) together with the estimation of costs that were covered from the regular activities and general or other programmes of the specific institution (e.g. material costs). A positive shift has been made in relation to funds that were spent from the County Budgets, which were in 2009 significantly higher than in 2008. This indicates that the Counties have taken an active role in the implementation of County Action Plans on Drugs, which affects on the State Budget discharge.

2 Drug use in the general population and specific targeted groups

The importance of drug-related research becomes crucial when a country or other specific area needs to understand drug problems in their own and wider context, sharpen their awareness and respond with evidence-based arguments. For an assessment of the prevalence of drug abuse, the research of the general population is still the most relevant.

2.1 Drug use in the general population

In Croatia, there has been no general population survey on illicit drugs so far. The main reason for that is the lack of financial resources. However, in the 2009 National report the argumentation paper for the survey was presented. In 2010, a feasibility study for the survey was carried out and a general population survey is planned for 2011. More information on feasibility study will be available in the next National report.

2.2 Drug use in the school and youth population

The European School Survey Project on Alcohol and Other Drugs (ESPAD) has been implemented in Croatia since 1995 (1995, 1999, 2003, 2007), and the results are used for the comparison of psychoactive drugs use trend on both the national and European level. The most recent ESPAD research was conducted in 2007, and no other research has been carried out on the national level since. The researches on the use of drugs on the local level are presented in subchapter 2.3.

2.3 Drug use among target groups / settings at national and local level

County research on smoking, alcohol, gambling and drugs among pupils

The "Sveti Rok" Institute for Public Health of the Virovitica - Podravina County and the Committee for Combating Addiction of the Virovitica - Podravina County conducted a county reserach on smoking, alcohol, gambling and drugs among pupils of 16 primary and 7 secondary schools. It was conducted in the form of an anonymous survey of sixth-grade pupils of primary schools and second grades of secondary schools in Virovitica - Podravina County for five consecutive years. The first survey was conducted in the school year 2004/2005, and the last one in the school year 2008/2009.

The aims of the research was to become acquainted with the attitudes and behavioural patterns of primary and secondary school pupils with regard to the research parameters, and to find a possible difference between primary and secondary school pupils. In order to detect possible changes in the attitudes of pupils of different age, the results were compared to those of previous generations. Another aim was to compare the answers of sixth-grade pupils of primary schools of the first generation, surveyed in the school year 2004/2005, with the answers of second-grade pupils of secondary schools of the most recent generation, surveyed in the school year 2008/2009, since those were mostly the same persons.

The survey was designed by the members of the Committee for Combating Addiction of the Virovitica - Podravina County. It was conducted with the aid of school prevention programme

coordinators and the funding of the Office for Social Affairs of the Virovitica – Podravina County. The anonymous survey consisted of 27 questions encompassing smoking tobacco, drinking alcohol, gambling, and the availability of drugs and spending free time. Most of the questions were multiple choice questions, so that pupils could chose the most appropriate answer, except for several questions, where pupils wrote the answers themselves. The school coordinators administered the survey each in his/her own school with the help of the class master. At the end of each year, it was delivered to the county coordinator. After the five-year survey, all survey sheets were at the same time processed at the "Ivo Pilar" Institute for Social Research in Zagreb.

Table 2.1 – Survey participants in the County research on smoking, alcohol, gambling and drugs among pupils, according to school years

School year	Survey participants	
	Number	%
2004/2005	1 880	21.3
2005/2006	1 596	18.1
2006/2007	1 495	17.0
2007/2008	1 964	22.3
2008/2009	1 872	21.3
TOTAL	**8 807**	**100.0**

Source: the "Sveti Rok" Institute for Public Health of the Virovitica – Podravina County

The research included sixth-grade pupils of primary schools and second-grade pupils of secondary schools due to their age (12 and 16 years, respectively), in which changes to their behaviour and attitudes usually occur. Table 2.1 shows the survey participants according to the school years. A total of 8 807 pupils (1 761 per year, on average) participated in the 5-year-long survey, 4 432 (50.3%) out of which were male and 4 220 (47.9%) female. For 155 (1.8%) pupils the gender is not known due to an incomplete survey sheet. Out of the total number of pupils, 5 047 (57.3%) went to the sixth grade of a primary school, while 3 760 (42.7%) went to the second grade of a secondary school.

The results show that 11.9% of pupils smoke regularly, 10.5% occasionally, and 77.7% never. During the 5-year report period, the percentage of pupils who never smoke increased from 72.4% to 80.2%, and the greatest changes can be seen in the ranking and frequency of answers about the main reasons for smoking cigarettes. "To look more important in front of my peers" was chosen by 51.6% of primary school pupils and 23.7% of secondary school pupils who participated in the research. Secondary school pupils smoke mainly because they think all they friends do. Only 3.4% of primary school pupils stated that they drank alcohol regularly, 52.7% of them drink alcohol occasionally, and 43.9% never. In secondary schools, 22.9% drink alcohol regularly, 66.3% occasionally, and only 10.8% never. As much as 66.8% of primary school pupils and 50.8% of secondary school pupils do not know whether the pupils from their school take other psychoactive substances. Primary school pupils consider that marijuana (19.6%) and cigarettes (13.1%) are the most frequently used addictive substances by the youth, while secondary school pupils mention marijuana (35.3%), ecstasy (11.3%) and cigarettes (5.3%).

According to data on the total number of treated persons per 100 000 people (aged from 15 to 64) in the Croatian counties in 2009, Virovitica – Podravina County has lower rate of treated addicts (74.0) than Croatian average (258.9) (Katalinić 2010). This low rate can be the result of different factors and prevention activities are one of them. Even so, the information on behavioural patterns and attitudes of pupils of different age are precious and

will be taken into consideration to improve prevention activities and make them more efficient.

Manifestations of drug abuse among adolescents

The "Dr. Andrija Štampar" Institute for Public Health conducted a research in 2009 titled *Manifestations of drug abuse among adolescents* (Orban, in press). The research was a continuation (replication) of a research conducted in 2006. It was a transversal study of primary and secondary school pupils in Zagreb – from the eighth grade of the primary school to the fourth grade of the secondary school. A total of 2 516 pupils from 73 primary and secondary schools in Zagreb participated in the research. A random and stratified sample was used. The survey can also be found in ST2, 2010. However the standard table contains only the data for pupils aged 14-18 (2 396 pupils, or 95.2%). Other 120 pupils are secondary school pupils aged 19 and 20, mostly persons that had to retake a class during their schooling.

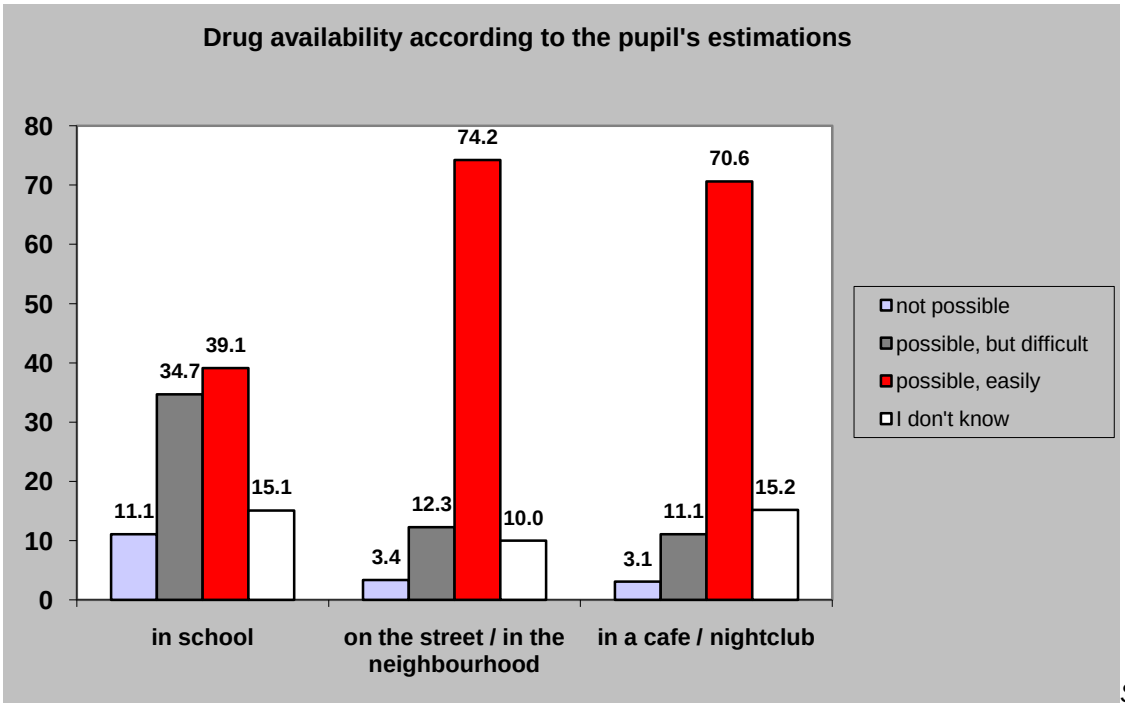
The research was conducted by means of a modified survey, i.e. the survey was expanded to include other disorders, taking into consideration many factors, like the biological and psychological status of the adolescents, family relationships, adjustment to school, peer relationships, free time, addictive behaviour (tobacco, alcohol and other psychoactive substances), value system and attitudes towards drugs, and manifestations of other types of deviant behaviour. Participation in the survey was anonymous and voluntary. It was carried out in class, over the course of 45 minutes. The pupils completed the survey sheet by themselves, having first received instructions from a trained researcher who carried out the survey in the class directly. The completed survey sheets contained no identification labels, and survey participants inserted them into envelopes and handed them to the researcher, who delivered them to the Service for Mental Health and Addiction Prevention after the survey. The aim of the research was to determine how widespread drug abuse was among adolescents, and the correlation between various psychosocial variables and drug abuse.

The results indicate that most of the pupils have at some point experimented with alcohol and tobacco. The substances that are the most frequently experimented with are marijuana and hashish. For other substance, the frequency of use is, as could be expected, much lower, and usually no higher than 7.5% in the total sample. It can be concluded that legal addictive substances are abused much more often than illegal substances.

Similarly, 26.9% of survey participants smoke cigarettes every day, while 50.7% do not smoke at all. There is a slight increase in the frequency of smoking compared to the data from 2006, when 6.5% of pupils did not smoke at all, while only 1% more pupils smoked every day. 29.8% of pupils do not drink alcohol at all, while 3.7% drink every day. 86.4% of pupils have not consumed marijuana in the last 30 days, while 1.2% smoke it every day. 5% of pupils have consumed marijuana several times in the last month, while 5.7% consume it once a month. Pupils start to drink alcohol and smoke cigarettes at roughly the same age on average, as early as in primary school (12.1 and 12.8 years, respectively). They start using marihuana at the age of 15 on average, in secondary school. If we compare these results with those from the 2006 research, it is clear that the age of the first consumption of addictive substances has decreased by one year of chronological age on average.

There is only a slight difference between girls and boys when it comes to the frequency of experimentation with drugs. Girls experiment with sedatives more often, while boys are more biased towards ecstasy. However, when it comes to daily use, there are much greater differences. Boys smoke marijuana 5.2 times more and drink alcohol 2.7 times more than girls, while girls abuse sedatives 2 times more. There is no difference between genders when it comes to smoking.

Figure 2.1 – Drug availability in schools, on the street (in the neighbourhood) and in cafés/nightclubs according to the pupils' estimations



Source: "Dr. Andrija Štampar" Institute for Public Health

The availability of drugs to pupils was tested by means of several questions about whether the pupil has ever come in contact with a person that he/she certainly knows to be taking drugs, and how he/she views the possibility of obtaining drugs. A great number of pupils find drugs readily available. It is especially worrying that drugs can be easily obtained around school, as well as in places where young people meet and spend their time.

Intercorrelations of the tendency towards experimenting and regular use of different psychoactive substances, using the Pearson's correlation coefficient, are shown in the Table 2.2.

Table 2.2 – Intercorrelation of the abuse of different addictive drugs

	Intercorrelations[22]	
	Experimenting	Regular use
tobacco – alcohol	0.47**	0.44**
tobacco – marijuana	0.40**	0.34**
tobacco – other illicit drugs	0.20**	0.08**
alcohol – marijuana	0.24**	0.28**
alcohol – other illicit drugs	0.12**	0.10**
marijuana – other illicit drugs	0.53**	0.38**

[22] $p<0.01$ – the correlation is statistically significant with the risk of error less than 1%

Source: "Dr. Andrija Štampar" Institute for Public Health

It is clear that there is a sigificant positive correlation in the abuse of different drugs, both in experimentation and regular use. This shows that adolescent that experiment with or regularly use some drugs are more prone to experiment with or regularly use other drugs. The highest correlations can be seen between tobacco and alcohol use, and marijuana and other illicit drugs. For example, pupils who use marijuana regularly display the tendency use other illicit drugs more often. The results are similar to those obtained in 2006 (Orban in press).

The research also included the correlation between drug abuse and different aspects of psycho-social adjustment, but only the most relevant results are mentioned in the text.

Illicit drugs in wastewater of the city of Zagreb – estimation of drug abuse

From February to September 2009, the research Highly specific measurement of the quantities of illicit drugs in communal wastewater as the basis for determining the trend of drug abuse in Zagreb was carried out. It is a project of the City Office for Health and Veteran's Affairs in Zagreb, carried out in cooperation with the Sea and Environment Research Institute of the "Ruđer Bošković" Institute and the "Dr. Andrija Štampar" Institute for Public Health. The project was funded by the City of Zagreb with EUR 49,459.46. Zagreb thus became the fourth city (after London, Milano and Lugano) that conducted such a research project.

The researchers systematically monitored cocaine, heroin, amphetamine, ecstasy, marijuana, methadone and codeine in unprocessed wastewater in Zagreb. Samples of the wastewater were collected at the central processing plant between February 9 and September 3, 2009. This new approach in the estimation of drug abuse rests upon the analysis of drugs and their metabolites in communal wastewater. It is based on the assumption that the communal wastewater collected near the inlet of the central processing plant is, in effect, a much diluted urine sample of the entire city population. After use, drugs are excreted from the organism either unchanged or as one or more metabolites, and as such reach the communal wastewater. The samples were collected at the inlet and outlet of the water processing plant for 24 hours, which indicated that, for example, cocaine and ecstasy were used more over the weekend, while there were no such rules for marijuana, which is the most widely abused drug (Terzić, Senta, Ahel 2010).

The research enables a systematic monitoring of the abuse of many illicit drugs, and can significantly contribute to timely measures for combating addiction. It can also detect various psychoactive drugs with a great degree of reliability, even if they enter the city wastewater in the quantity of only several grams a day. A comparison with the habits of drug addicts in Milan, Lugano and London, where a research using the same methodology was carried out, shows that the citizens of Zagreb, like other Europeans, prefer marijuana. Heroin has the second place in Zagreb according to the quantity consumed, while in Europe cocaine is the second. Still, police data indicate that in Croatia the use of cocaine has been on the rise in the past several years as well. It is interesting to note that, regarding consumption per 1,000 inhabitants, the use of marijuana in Zagreb is similar to the use in Milan, but also lower than in London.

3 Prevention

In the process of implementation of the National Strategy on Combating Narcotic Drugs Abuse in the Republic of Croatia for the period 2006-2012 (National Strategy) a special attention is being put to the development of addiction prevention among children and youth. The classification of prevention[23] by the Institute of Medicine (IOM) (www.emcdda.eu) on universal, selective and indicated prevention is usually used.

Addiction prevention programmes in the Republic of Croatia are being realised primarily at the level of local communities, i.e. counties. There are 21 counties in the Republic of Croatia, and in each of them the County Committee on Combating Drugs Abuse (County Committee) has been established, involving experts from different fields: education, social care, health, non-governmental organisations, offices of state administration and other relevant institutions that are actively involved in the field of combating drugs abuse. The primary task of the County Committee is to coordinate, plan and monitor the implementation of the programmes in the field of prevention, treatment and combating drug abuse on the local community level, and is responsible for creating the County Action Plan on Drugs according to the specific needs of a given county.

The National Strategy and the Action plan on Combating Narcotic Drugs Abuse in the Republic of Croatia for the period 2009-2012 (Action plan) have defined the tasks of individual ministries and state administration bodies regarding the definition, planning and implementation of prevention programmes. The Office for Combating Drugs Abuse (OCDA) has been cooperating continuously with the County Committees, and monitors the implementation of the National Strategy and Action Plan on the national level. The Ministry of Science, Education and Sport is in charge of the implementation of prevention programmes in educational institutions, while the primary task of the Ministry of the Family, Veteran's Affairs and Intergenerational Solidarity is oriented towards the protection of a family, as well as the development and strengthening of encouraging high-quality relationships among its members. The Ministry of Health and Social Welfare participates in the implementation of prevention programmes primarily within school medicine services, addiction prevention services in the Institute of Public Health and educational system.

Since both practical experience and the reports on the implementation of the National Strategy and Action plan have shown that addiction prevention programmes are implemented in segments, on an irregular basis and without systematic evaluations, the OCDA has, in cooperation with competent ministries and other competent administration bodies, founded a Working Group for the Creation of the National Addiction Prevention Programme for Children and Youth in Educational Settings and in Social Welfare System for the period 2010-2014 (National Programme). The working group was tasked with the analysis of the state of affairs and determining the needs related to prevention work with children and youth; creation of prevention standards, including harmonisation of concepts and terminology related to addiction prevention; emphasising the activities and measures to

[23] **Universal** prevention strategies address the entire population (local community, pupils, neighbourhood). The aim of universal prevention is to deter or to delay the onset of substance abuse by providing all individuals the information and skills necessary to prevent the problem. **Selective** prevention serves specific sub-populations whose risk of a disorder is significantly higher than average, either imminently or over a lifetime. **Indicated** prevention aims to identify individuals who are exhibiting indicators that are highly correlated with an individual risk of developing substance abuse later in their life (such as psychiatric disorder, school failure, dissocial behaviour etc.) or additionally early signs of problematic substance use (but not clinical criteria for dependence) and to target them with special interventions (http://www.emcdda.europa.eu/themes/prevention/responses-in-eu)

be encompassed by the National Programme. Apart from smoking, alcohol and drugs, other forms of so called modern addictions are becoming increasing prevalent among children and youth, the most salient of which are addictions to gambling and the internet. With regard to that, the aforementioned National Programme is the first programme that merges all preventive strategies, and whose aim is to combat and prevent all forms of addictions among children and youth, as well as risky behaviour of children and youth related to experimenting with addictive drugs, including the prevention of the addiction to drugs, alcohol, smoking, internet, gambling and other. The programme consists of addiction prevention programmes for pre-school children and pupils, university students, and children and youth in social care. Furthermore, the evaluation criteria for prevention programmes and addiction prevention standards are detailed. Their aim is to improve the preventive strategy of all forms of addiction. The National Programme was adopted by the Croatian Government in June 2010, and a more detailed overview will be presented in the next National Report.

In December 2009, a two-day seminar, organised jointly by the OCDA and the European Commission, was held in Zagreb. It showcased the best practices in the field of preventive work with children and youth in EU member countries, and presented some guidelines and recommendations for the creation of the National Programme and for a further development of prevention programmes in the Republic of Croatia. Apart from experts from EU member countries (Portugal, Spain and Poland), the seminar was attended by Croatian experts, members of the Expert Working Group for the Creation of the National Programme, and representatives of County Committees.

The application of the Act on the Restriction of the Use of Tobacco Products[24] has been controlled primarily regarding the smoking ban in all institutions that perform educational activities, and amendments were later adopted to ban smoking in health institutions as well, with the exception of psychiatric patients in select rooms of those institutions.

3.1 Universal prevention

School

The educational system has taken the largest share of responsibility for organisation and implementation of the addiction prevention programme. The main goal is to reduce the interest of youth for trying the addiction substances and to increase the pupils' quality of life. Prevention activities in school settings have been carried out in cooperation with county prevention coordinators and prevention programme leaders in educational institutions. More information on this topic can also be found in SQ 25, 2010.

School prevention programmes are carried out by every educational institution in accordance with its specific features and needs. In most of the regions, each school adjusts its activities to its better or poorer working conditions. The activities within the programme were oriented towards working with students, parents and education workers, through pedagogical workshops, debates, public discussions, thematic lectures and teacher-parents meetings. Throughout their curriculum and in homeroom classes, pupils are informed about the ways of spending their free time and adopting a healthy lifestyle. The tasks of the programme are realised through the fulfilment of pupils' needs, improvement of the quality of life in school, family and wider community. One of the aims of prevention programmes in school is the encouragement of a positive cooperation between the pupils, parents and school, primarily through different activities which encourage pupils to work on themselves and to develop self-respect, altruism, empathy, social skills (decision-making skills, constructive problem resolution, critical thought). Other goals are to create a positive learning environment, to

[24] Zakon o ograničavanju uporabe duhanskih proizvoda (NN 125/08, 55/09, 119/09)

educate parents on successful parenting, and to educate teachers and other members of the school staff.

In 2009, the Republic of Croatia started implementing the prevention programme *Unplugged – preventing the use of tobacco, alcohol and other addictive substances* (*Imam stav* in Croatian), which was created on the initiative of the European Union Drug Abuse Prevention (EUDAP). From August 2009 to July 2011 the project will be adapted and implemented in 13 primary schools in and around Zagreb under the leadership of experts from the Faculty of Education and Rehabilitation Sciences, University of Zagreb. The project includes four more European countries, and is led and funded by the Mentor Foundation International. The programme is based on the acquisition of life skills and the concept of social influences. It promotes positive and healthy behaviour, and helps prevent the use of addictive drugs (smoking, alcohol and other addictive drugs). For further information please consult SQ25M, 2010 and EDDRA, 2009. More information on evaluation will be provided after the evaluation is completed.

In Primorje – Gorski Kotar County, the *Life Skills Training* programme was continued. As an example of a good practice, it was adopted by some other counties (Varaždin County and Zadar County). The program consists of life skills strengthening workshops for sixth and seventh grades of primary schools (24 workshops in total), and was first implemented in Primorje - Gorski Kotar County during the school year 2005/2006. The programme contains topics like decision-making, self-respect, assertivity, media influence, smoking, alcohol, marijuana, communication and social skills, peer pressure, anxiety, conflict resolution, etc. The workshops are led by class masters who have completed a four-day education by the local county institute for public health. The programme included 3 658 pupils in Primorje - Gorski County, and the subsequent evaluation showed a reduction in the use of addictive drugs by pupils in schools where the workshops were organised.

The same organisation implemented the program *Ready-Steady-Healthy*. It consisted of five workshops with pupils of the eighth grade, and its aim was to prepare the pupils for the transition from the primary to secondary school. The programme is a follow-up to the programme *Life Skills Training*, and deals with topics like stress and stress handling, resisting peer pressure, myths about drug use, free time and healthy lifestyles. The programme included 100 pupils, and an evaluation showed that pupils who were involved in the programme could recognise peer pressure with a higher degree of certainty, that they used active strategies of stress handling, and that they were better informed about the dangers of drug abuse than their peers that had not been involved in the programme.

In pre-school institutions, the programme of universal prevention is a part of the regular curriculum, and it is constantly carried out throughout the year. The programme is oriented towards the development and greater appreciation of children's elementary physical needs, protection of children's life and health, need for safety, tenderness and love, and the need to be curious and to actively create relationships towards the world and environment. The example of this is the programme *Developing self-respect – the most important childhood task*. It was implemented in kindergartens and junior grades of primary schools in Split – Dalmatia County. The task of the programme is to sensitise and encourage those around children to acknowledge the importance of the children's self-respect, and to create a positive environment for its development. In pre-school institutions, the program was implemented under the name *I see you – I see me*. The emphasis was placed on the specific characteristics of the development phases of a child aged between 0 and 6.

Family

Family is the most important socialization unit and different surveys (Ferić 2002; Brajša-Žganec, Raboteg-Šarić, Glavak 2002; Ivandić, Zimić, 2010) emphasizes its' role in drugs abuse prevention. Prevention programmes in the family environment are oriented towards building family connectivity and relationships, including the strengthening of parental skills, development of communication skills and creating a family policy for substance non-use. In short, by focusing on family interventions targeting the general population, specific family behaviours change positively, which can later reduce the risk of drug use. Since the family is the first educational and protective factor in the development of a young person, a special emphasis is placed on building and strengthening the encouraging quality relationships among their members, which includes improvement of parental competences and skills, improving at the same time its educational function.

The activities of family centres have been carried out with the aim of strengthening the family to be able to face the drug use problem more successfully, as well as by organising counselling work with children and parents connected with drug abuse. In 2009, the Ministry of the Family, Veterans' Affairs and Intergeneration Solidarity co-financed the work of 17 County Family Centres.

An example of a prevention programme focused on the family is the *School of quality parenting*, implemented in a primary school in Pula through 10 workshops on a weekly basis (two hours once per week). The aim of the parent education was building quality relationships and communication with children and other family members, developing self-respect and self-confidence in children, and the prevention of risky behaviour (drug abuse, internet addiction, delinquency, promiscuity, etc.). The users were divided into a basic group (consisting of 14 parents) and an advanced group (consisting of 10 parents), with a final evaluation at the end of the course using survey sheets. The results indicated that parents considered the course helpful and that they felt more competent in their parental role. They stressed that they gained the most in the acquisition of good communication skills (active listening and I-Messages), easier setting of limits in child rearing, and recognition of their children's needs. The users found the education of this type necessary and desirable for all parents of school-aged and pre-pubescent children.

In Istria County few more programmes focused on parents were implemented, such as educational workshops for parents *Successful Parenting*, which aimed to encourage protective factors that support a positive development of the family through the acquisition of efficient communication skills, recognition of the parents' and children's needs, and establishment of a good relationship between parents and their children. Two more programmes were implemented in the same county: *The Course of Quality Parenting*, which combined interactive games, theoretical knowledge and communication programmes; and *The Family is the Most Important*, which educated parents on responsible parenting, attitudes and habits.

Community

Universal prevention programmes are often planned at the local community level as multidisciplinary activities in which different sectors are included.

In July 2009, the Croatian Government adopted the National Programme for Youth 2009-2013, which outlined the basic guidelines of the national policy towards the youth. Youth clubs were supported by the Ministry of Family, Veteran's Affairs and Intergenerational Solidarity, which funded 31 projects of associations related to youth clubs in 2009. In youth clubs, most of the activities are created by young people for young people, and they are

aimed for organising free time activities of the youth in a local community and offer everyday programme/activities/services for the youth. Activities like providing information for satisfying the needs of young people, which cover a wide range of topics and are practical and accurate, contain different educational and entertainment activities, and are available to all young people are implemented through the activities of regional Info Centres for Youth in Split, Osijek, Rijeka and Zagreb.

The necessity of both the role of quality free time and active participation of the youth in the planning of activities are visible in the programme *Action is Prevention*, which was implemented in Osijek – Baranja County. The purpose of the programme was to educate young people for independent planning, organisation and implementation of free time as a means of preventing risky behaviour.

Different programmes that promote constructive free time and sports activities are implemented mainly by the non-governmental sector. For example, the Judo Association in Zagreb implemented a one-hour programme with lectures on sports culture and demonstrations of several sports (judo, fencing, rhythmic gymnastics, etc.) in ten primary schools in several countries. The target population consisted of pupils from the first to fourth grade of primary schools, while their peers demonstrated the sports to facilitate the identification process. After the demonstration, the pupils received a children's sport encyclopaedia “Little Athletes”, so that they could study it and choose their own sport. This created a connection between the children, parents, primary schools and sports club for the purpose of improving the health and holistic development of children, as well as preventing risky behaviour, especially drug abuse.

A good example of inter-sector cooperation is the programme “Together we can do more”, which has been implemented by the City of Zagreb in cooperation with the police and educational institutions in Zagreb for six consecutive years. The programme consists of several components aimed at the prevention of drug abuse, addiction, vandalism, peer violence and other forms of risky behaviour. The target population consisted of pupils of the fourth and sixth grades of primary schools and their parents. For example, the component “I can if I want 1” was aimed at pupils of the fourth grade to sensitise the children to contact with the police and the basics of self-defence. In 2009 it involved 8 041 pupils. The component “Prevention and alternative” was aimed at pupils of the sixth grade to protect the healthy population from drugs, vandalism and violence, and getting to know the home beat police officers as friends and helpers. The component involved 7 026 pupils, while the component “I can if I want 2” (aimed at the parents of sixth grade pupils) involved 3 646 parents.

3.2 Selective prevention in at-risks groups and settings

At-risk groups

An overview of selective prevention activities in Croatia can be found in SQ26, 2010. In the reporting period, some activities for building networks for children in at-risk families have been continued. An example is the activity *Small creative socialisation groups that* have been conducted in different counties. The method was conducted in the course of one school year by trained professional workers of departments of social services in cooperation with teachers and other professional workers in school. Group work was carried out with children from at-risk family settings and those of risky behaviour. The activities consisted of direct work with a group of children in primary schools. The meetings were held on a weekly basis for two school periods (90 minutes). A leader worked directly with children, but also with parents. Parents attended special workshops, which are focused on better understanding of their children’s needs and learning and practising communication skills.

Prevention activities of *prolonged expert procedure*, which is conducted in primary schools in the area of the City of Zagreb and the Zagreb County, have also been continued. They are organised and carried out by the professionals from the Home for Education of Children and Youth Zagreb. The prolonged expert procedure programme in primary schools has the characteristics of selective prevention and it is carried out on the spot of the social adjustment problem, in accordance with the orientation towards de-institutionalisation and early intervention in cases of the manifestation of risk behaviour among primary school children. Therefore, the aim of the programme is not addiction prevention as such, but the development of communication, social skills and self-confidence in children contributes indirectly to addiction prevention.

The centre for psychological counselling, education and research Sirius implemented the project “Healthy childhood”. Its purpose was to prevent drug addiction in children and youth by promoting healthy lifestyles, encouraging users to spend their free time productively, and strengthening relationships and healthy forms of communication between the youth, peers and family members. The project involved 298 persons, mainly children and youth aged 12 to 20 who are coming from at-risk families and who experiment with drugs. Project activities were aimed at direct individual counselling of the youth and their families, lectures and workshops for families, and psycho-educational and art workshops.

At-risk families

For parents who repeatedly manifest various kinds of failures and negligence in children's care (e.g. parents who are prone to addictive behaviour) or parents requiring special help with their child's upbringing (e.g. a child manifesting addictive behaviour), the Social Welfare Centre conducts *the measure of supervision over parental care* (for more information on this measure please consult the 2009 National Report). The role and importance of such legal protection was emphasised by the Social Welfare Centre in Koprivnica in cooperation with the “Friend” Association for Aiding Children and Youth by implementing the programme “*Let's support SoPC (Supervision over Parental Care) – let's support family”*. The program consisted of a series of workshops that include families who have been sentenced to the measure of supervision over parental care, and was aimed at adoption and improvement of parental skills, but also the development of the children's social skills. The programme involved 66 parents, 110 children and 60 supervisors. Upon the completion of the programme, the children displayed pro-social behaviour more often and complained about psycho-somatic ailments less frequently. Still, a systematic evaluation is required to assess whether the change in the children's behaviour is the result of the workshops or the legal protection measure.

The importance of an active participation of parents in prevention activities is demonstrated by the programme *Parents for parents*, implemented by the “Zajednica Susret” Parents' Association in Rijeka. The programme is aimed at the families of drug users. Taking into consideration the important role of the family in early detection and prevention of recidivism in drug users, addicts and former addicts, the programme focuses on strengthening protective factors within a family, nurturing of social support by family members, developing stress-management and parental skills, as well as raising the consciousness of the family dynamics that may influence the development of addiction. The purpose of the programme is to support and aid families of drug users, and to exchange information that may facilitate the treatment of addiction.

In 2009, family centres continued to implement counselling activities with parents who sought help for, for example, parenting difficulties, manifestation of socially unacceptable behaviour in children, or risky behaviour that may lead to addiction.

Unhealthy family relationships, deviant behaviour in children, and low communication and social skills are often connected to the quality of family relationship and it is known that inadequate parenting styles may influence the development of addiction in children. The combination of interactive games, theoretical knowledge, communication exercises and principles of Glasser's Choice Theory were integrated into the programme *Quality Parenting Course*, implemented in the Istria County. Educational institutions, departments of social services, physicians working in adolescent and general medicine, and the "Suncokret" Centre for Humanitarian Work referred the parents of children who manifest undesirable behaviour to the course. By working actively on their own development, acquiring new knowledge, getting acquainted with a healthy family atmosphere, contemplating the values, desires and needs of children and parents, the participants assembled a picture of quality parenting and had the opportunity to question their attitudes, learn about new modes of behaviour and relationships and to create better family relationships. Parents could opt for individual counselling during the course or afterwards to gain support and to retain and implement the knowledge they had learned. The project involved 61 users (40 in Pula and 21 in Medulin), and the results of an evaluation showed that the parents were pleased with the topics, that their communication with their children had improved, and an decrease in the number of incidents in children who had manifested unacceptable behaviour.

Recreational settings

As in the previous years, in primary and secondary schools and in pupils' homes, at-risk students were included in extracurricular activities with the aim of their better socialisation and training for proper behaviour in risk situations.

3.3 Indicated prevention

In 2009, Social Welfare Centres continued providing activities for the youth who already manifested certain addiction behaviours. As it was described in the last National Report, in the course of the pre-trial proceedings involving a minor or younger adult, the State Attorney's Office might apply the principle of opportunity and in such way impose a special obligation on a person to start a drug-abstention treatment and enter the work of a youth counselling centre. Also, the Social Welfare Centre might pronounce an educational measure of intensified care and supervision to minors and younger adults who, for example, experiment with drugs.

The programme of addiction prevention in young people who manifest risky behaviour is implemented by the Terra association in Rijeka. The aim of the programme is to involve the population that already manifests various forms of deviant behaviour, including addiction. The users of this programme are minors and young adults whose early deviant behaviour was detected by teachers and class masters of primary and secondary school. The programme includes different activities and methods like individual and group counselling, cooperation with families and parents, social skills workshops, development of hobbies, and other activities that contribute to the development of a responsible and active personality. In 2009, 170 users were included in this programme.

In cooperation with OCDA, the Ministry of Health and Social Welfare and the Croatian Institute of Public Health in June 2009 organised a two-day supervision seminar for experts who work with youth manifesting risky behaviour for the implementation of the MOVE programme. Upon the completion of the seminar, 12 trainers previously educated at the educators' workshops for the MOVE programme held in 2007 and 2008 obtained a license, becoming certified trainers for the further implementation of the aforementioned educational workshops of the MOVE programme. The MOVE programme was modeled after the German

programme and adapted to Croatian needs. It consists of 12 modules and its basic goal is to include youth who would not come to counselling otherwise. For more information on the MOVE programme please consult 2009 National Report.

3.4 National and local media campaigns

Regarding the implementation of the National Campaign on the Influence and Harmful Effects of Drugs, all competent ministries and other state administration bodies conducted the campaign independently within the activities specified in the Annual Implementation Plan of the Action Plan for the year 2009.

As in the previous years, the OCDA and other state administration bodies created, printed and distributed educational and promotional materials and leaflets targeted at parents, children and youth, and cooperated with the media on the local level, in radio and TV programmes, round table discussions and public meetings with the aim of educating and informing children, youth, parents and others about the harmful effects of drugs. The OCDA made a promotional video about addiction that was broadcast on national television. As in the previous years, the International Day against Drugs Abuse and Illicit Trafficking on June 26 and the Drug Addiction Recovery Month were marked. On media campaigns activities the OCDA participated with EUR 15,713. In 2009 the Anti–Drugs telephone received about 900 calls, and the most common inquiries were related to the information on the places where the persons addicted to drugs can seek treatment and rehabilitation.

The Drug Addiction Recovery Month was marked on the local level as well. For example, the Dubrovnik – Neretva County implemented the Anti-alcohol media campaign which aimed, through radio, television and the local newspapers, to raise the consciousness of the society/citizens about the dangers of drug and alcohol use by broadcasting radio commercials and a jingle on local television, issuing newspaper articles on a weekly basis and organising promotional concerts for the youth. The campaign was evaluated by means of survey sheets, which were handed out to random passers-by in the biggest three shopping malls in Dubrovnik. The survey participants had to answer whether they have heard of the Drug Addiction Recovery Month on television, radio and/or newspapers. 41 (58%) out of a total of 70 survey participants had heard of the Drug Addiction Recovery Month – most of them had read about it in the newspapers and the internet.

4 Problem drug use

The term “problematic drug user” in Croatia refers to the persons who have entered treatment due to psychoactive drug misuse since the consumption of drugs is related to serious health and social problems, as well as to problems with the law. Among many problems in the area of public health, drug misuse is a medical and social phenomenon attracting a lot of attention. However, despite the discrepancy between the Croatian and EMCDDA definition of problem drug use (PDU) which is more focused on specific patterns of drug use, the data and information presented in this chapter will follow the EMCDDA definition, in order to provide comparable data on the European level.

4.1 Prevalence and incidence estimates of PDU

In 2009 national estimation of Problem drug users was done by mortality multiplier method like it was done in the previous years. Data for calculation were taken from the *General Mortality Registry* and the Registry of Treated Psychoactive Drug Abusers (CIPH). As we started to calculate mortality multiplier few years before in the 2009 we calculated it again using the same method. From the General Mortality Registry we collected data for all drug related deaths.

Mortality multiplier was calculated (1.54) for a six-year period (2004-2009) as average proportion of total number of opiate overdoses and overdosed opiate users recorded in the Registry of Persons Treated for Psychoactive Drugs Abuse. The benchmark was the number of the persons treated in 2009 defined according to EMCDDA definition of PDU - treated persons who injected drugs or persons who were regularly taking opiates, cocaine or amphetamines any route of administration (N = 2042). Persons who were previously treated for opiate addiction and currently are on opiate substitution treatment were excluded from the number taken for estimation. Those treated persons were not considered problematic. Central estimated number of problem drug users (PDU) in Croatia for 2009 is 3145. Information on PDU can also be found in ST7, 2010.

Table 4.1 - Estimation of the size of the problem drug users’ population using the mortality multiplier method

	Low	High	Central
Estimated number	2521	4167	3145
Rate/1000 (all ages)	0.57	0.94	0.71
Rate/1000 (15-64)	0.85	1.40	1.06

Source: Croatian Institute of Public Health

4.2 Data on PDUs from non-treatment sources

In 2009 there were no studies on PDU population in non treatment sources.

5 Drug-related treatment: treatment demand and treatment availability

Approach to drug addiction treatment is based on the treatment guidelines identical to other chronic non-infectious diseases. The treatment is being planned and implemented in compliance with the needs of an individual and is being modified according to the state of disease. During 2009, 7 733 persons were treated within the health system, and the total number of the treated persons has not changed significantly in the last four years.

5.1 Strategy/policy

General health system in Croatia is under supervision of the Ministry of Health and Social Welfare, which also covers all state institutions involved in the treatment of drug addiction as a part of healthcare. In the area of inpatient treatment, psychiatrists and psychiatric institutions play a particularly important role. According to the National Strategy on Combating Narcotic Drugs Abuse in the Republic of Croatia for the period 2006-2012 (National Strategy), clinics or general hospitals in bigger cities ensure conditions for addicts' detoxification, with an estimated one-month long average stay. After detoxification of drug addicts, patients are directed to further outpatient treatment.

The organisational ground for the treatment of drug addiction is outpatient treatment in the network of services for drug addiction prevention within the frame of the County Institutes of Public Health. Under the Health Care Law (OG 150/08) that came into force on 1 January 2009 and Health Services Network (OG 98/09), Services for Mental Health and Addiction Prevention were established at the County Institutes of Public Health, within which replacing former Services for Addiction Prevention and Outpatient Treatment function. In the course of outpatient addiction treatment, Services are the places where majority of drug addicts get in touch with specialized workers for the first time. These professionals carry out diagnostic procedures and in accordance with the clinical state, suggest potential treatment. The Services provide both drug free treatment and substitution or maintenance treatment. In any case, the treatment includes counselling, psychosocial support, individual or group psychotherapy, if needed. A network of the Services for Mental Health and Addiction Prevention within County Institutes of Public Health is coordinated by the Croatian Institute of Public Health (CIPH).

Expertly harmonised Croatian model which is based on the continuous cooperation and joint activity of above mentioned specialised outpatient Services and general practitioners or family medicine offices are implemented in the treatment. A family doctor actively participates in adequate intervention planning for every individual drug addict; arranges the modalities of treatment with the Services, controls the condition of every individual and provides (if required, under daily supervision) medications indicated by a specialist. The general practitioners' cooperation is enabled because they are obliged to accept the drug addicts as regular patients. This model allows broad accessibility to treatment through the primary health care system with the simultaneous assurance of the specialised expertise, integrated care for drug addicts, destigmatisation and normalisation of treatment, decentralisation and deghettoisation of drug addicts as well as low costs of the treatment programme.

The system for collecting data on addiction treatment developed in a few stages. Firstly, only the data on inpatient addicts' treatment were collected; later the data from the outpatient Centres for Addiction Prevention, which were not organised in a uniform way before, were added as well. By establishing the outpatient network of addiction treatment within the heath system in 2004 in Croatia the Services for Addiction Prevention and Outpatient Treatment

were founded in the County Institutes for Public Health, which are now replaced with Services for Mental Health and Addiction Prevention.

With the objective to further develop Treatment Demand Indicator in Croatia some changes have been introduced in reporting to the CIPH. Integration of the data from therapeutic communities is in the process. In fact, the Ordinance on the type and scope of work of the social welfare home, the way of providing care outside their own family, conditions of the facility, equipment and employees in the social welfare home, therapeutic community, religious community, association and other legal entities as well as the centre for assistance and care at home (OG 64/2009)[1] that was adopted by the Minister of Health and Social Welfare in June 2009 under the amendments of the Act on amendments to the Act on Social Welfare (OG 7/07) regulates the obligations of therapeutic communities to submit the data to the Croatian Institute of Public Health (for further information please consult Chapter 1.1). Although it was noticed that the services and treatment quality in the therapeutic communities that submitted the data to the CIPH had been considerably improved and harmonised with the Ordinance, the reports of therapeutic communities were inadequate and incomplete. It is important to note that the deadline for adjustments to the standards of the afore mentioned Ordinance is two years. It is expected that the adjustment of the therapeutic communities will result in further improvement of treatment services in the therapeutic communities and homes for addicts as well as in the improvement of the complete system for drug addiction treatment in the coming period.

Further efforts orientated towards the improvement of the quality of the service and programmes which are implemented in the non-governmental sector should still be made in order to realise some of the key guidelines of the overall policy in the field of combating, resulting from the National Strategy and the Action Plan on Combating Narcotic Drugs Abuse in the Republic of Croatia for the period 2009-2012 (Action plan). Among others, it primarily refers to improvement of treatment quality and psychosocial rehabilitation in therapeutic communities, professional and ethical working principles in them, and creation of a therapeutic community network in the Republic of Croatia, which will be a part of the comprehensive health and social care system of drug addicts.

5.2 Treatment systems

Organisation and quality assurance

Treatment of drug addicts in Croatia is organised within the national health system, while certain measures of treatment and rehabilitation can also be provided outside the health system. There are institutions specialised in inpatient and outpatient treatment of drug users:

1. inpatient treatment – psychiatric hospitals, wards and therapeutic communities
2. outpatient treatment – Services for Mental Health and Addiction Prevention, Addiction prevention Counselling centre Poreč, ward in the Clinical Hospital “Sestre Milosrdnice” and NGOs

Inpatient treatment

Croatia has accepted EMCDDA’s definition of inpatient treatment as a treatment which requires clients to stay overnight for a duration of several weeks to several months. Within the national health system the inpatient treatment consists of 33 psychiatry wards and

[1] Pravilnik o vrsti i djelatnosti doma socijalne skrbi, načinu pružanja skrbi izvan vlastite obitelji, uvjetima prostora, opreme i radnika doma socijalne skrbi, terapijske zajednice, vjerske zajednice, udruge i drugih pravnih osoba te centra za pomoć i njegu u kući (NN 64/09)

hospitals, a ward in a prison hospital and therapeutic communities (five therapeutic communities have used modified Pompidou form for collecting data and therefore are considered as a part of the national health system; prison hospital data is to be incorporated into the system).

In the Republic of Croatia there are 8 therapeutic communities and 32 therapy houses that offer treatment and psychosocial rehabilitation to drug addicts. Some therapeutic communities operate as associations or religious communities within humanitarian activities, whilst others are organised and registered as social care homes for addicts. Therapeutic communities conduct their drug-free treatment programmes for any kind of illicit drugs abuse, programmes for psychosocial rehabilitation and re-socialisation, family counselling, care provision service, organise self-help groups to help addicts' families, organise various educational promotional lectures with the aim of addiction prevention and participate as mediators for referring addicts to treatment in therapeutic communities outside the Republic of Croatia.

Outpatient treatment

Taking into account chronic relapsing course of the disease, the organizational ground for the treatment of drug addiction is outpatient treatment. Outpatient treatment is provided by 21 Services for Mental Health and Addiction Prevention, Addiction Prevention Counselling Centre Poreč, and by a ward in the Clinical Hospital "Sestre milosrdnice" and NGOs.

In the Services for Mental Health and Addiction Prevention there are different types of activities, such as individual counselling, working toward behaviour modification, ambulatory psychiatric treatment, health and social interventions. For more detailed description of the outpatient treatment please consult 2009 National Report.

Quality assurance

County representatives who participated in the implementation of prevention activities in local communities in the Republic of Croatia during the CARDS project "Strengthening the Croatian Capacity to Combat Drug Trafficking" that was implemented at the Office for Combating Drugs Abuse (OCDA) from September 2006 to February 2008, together with the OCDA representatives participated in the study visit to institutions for combating drugs in Berlin from 3rd to 7th May 2009. The study visit was organised by the German Ministry of Health, Environment and Consumers Protection in cooperation with the European Commission. A part of the study visit programme was a visit to institutions for drug addiction prevention and treatment in Berlin, a provincial department of Ministry of Health, Environment and Consumers Protection, a non-governmental organisation for prevention with the low entry threshold providing support and help to homeless children addicted to alcohol and /or drugs, a counselling centre specialised for young people addicted to alcohol and drugs, a therapeutic community (drug-free) for drug addicts accommodation providing special programmes for children and the Prevention Centre, the central institution for prevention in Berlin.

Representatives of nongovernmental organisations and of the OCDA and relevant ministries participated in professional training held in Ohrid, Macedonia from 22nd to 26 June 2009 as a part of the project *Italy's help and cooperation with the South European countries on drug demand reduction.*

In December, a professional meeting with the representatives from nongovernmental organisations that provide services to drug addicts and occasional drug users was held in the Ministry of Health and Social Welfare. The aim of the meeting was to introduce the existing legislation and the Ordinance on the type and scope of work of the social welfare home, the

way of providing care outside their own family, conditions of the facility, equipment and employees in the social welfare home, therapeutic community, religious community, association and other legal entities as well as the centre for assistance and care at home (OG 64/2009) and harmonising their work in order to provide quality treatment and rehabilitation of addicts in therapeutic communities.

The problem of opiate addiction was discussed in meetings of the OCDA Expert Council during 2009 and it was concluded that instead Subutex (buprenorphine) which showed great abuse potential, it was necessary to introduce a new drug Suboxone which contains buprenorphine as well as naloxone and which is being used in most European countries in treating opiate addiction. The Expert Council also discussed the problems that care homes and therapeutic communities face when adapting to standards set in the afore mentioned Ordinance, and other questions regarding their future integration in the social and health system, e.g. the question of financing therapeutic communities and social care homes, the organisation of aimed and interdisciplinary training for all professional workers and therapists in homes for addicts and therapeutic communities as well as other questions regarding the integration of programmes and ethical work standards in therapeutic communities required for treatment and rehabilitation of drug addicts.

As far as the education of health care and non-health care workers who participate in treatment of addicts is concerned, continuous education of health workers on application of pharmacotherapy of opiate users has been continued as well as the education of non-health care workers who participate in drug addicts care in the Addiction Reference Centre of the Ministry of Health and Social Welfare in the Clinical Hospital “Sestre milosrdnice“.

Availability and diversification of treatment

The treatment of drug addicts is carried out through substitution pharmacotherapy, drug free programmes, as well as family and psycho-social treatment. As explained earlier, the Croatian model enables treatment availability through primary health care offices and cooperation with the Services in the Institutes of Public Health.

Pharmacologically assisted treatment

There are few types of pharmacologically assisted programmes: short detoxification, slow detoxification, short (temporary) detoxification and long-term substitution treatment. The main indication for the opiate treatment (methadone, buprenorphine or others) is a confirmed addiction diagnosis according to the ICD-10 or the DSM-IV criteria. Opiate agonists play a crucial role in the modern approach to heroin addiction. The addiction treatment doctrine considers that only methadone or any other opiate agonist itself is not enough to change the deranged behaviour. That is why these medications have been used for attracting the heroin addicts to join the programme, after which the agonist pharmacotherapy is used if required, only as one of the elements of a complex addiction treatment, which includes psychotherapy, education and certain forms of psychosocial assistance. Substitution pharmacotherapy combined with psychosocial care is common treatment option for opiate users. Pharmacologically assisted treatment is conducted in inpatient and outpatient treatment and it is harmonized with the Guidelines for the Use of Methadone in the Substitution Therapy of Opiate Drug Users and with the Guidelines for the Use of Buprenorphine in the Substitution Therapy of Opiate Drug Users, which was adopted by the Croatian Government in 2006. According to the Guidelines for methadone maintenance program for opiate abusers, GPs (outside of specialist treatment centres) are providing the therapy that was ordered by specialists from and outpatient hospital treatment. In these terms we do not distinguish specialized GPs from other GPs. For more information on Guidelines please consult Chapter 11.

Drug free treatment, family and psycho-social treatment

Within the health system in Croatia, drug free treatment is available in inpatient health settings as well as in the outpatient settings in the frame of national network of Services for Mental Health and Addiction Prevention. For those addicts who can be motivated to follow a drug free procedure, one of the possibilities is a long-term stay (up to two years) in a therapeutic community. The Ministry of Health and Social Welfare has signed agreements on mutual relations with three institutions providing care outside their own family to persons addicted to alcohol, drugs and other opiates: Home for Addicts Community "Susret", Home for persons addicted to drugs and other opiates in Đurmanec and Association for Combating Drug Addiction "Ne/ovisnost", Osijek. According to the contract the Ministry pays for the accommodation costs for 186 users.

Prison treatment unit

In general, all addicted inmates, detainees and offenders are provided with the health care that includes medical examination, counselling, psychiatric assistance, testing on infectious diseases and substitution treatment. Modified therapeutic communities are in operation in penitentiaries in Lepoglava and Turopolje as so-called "drug free" departments, while in prisons they act as clubs of treated drug addicts. For further information please consult Chapter 9.5.

5.3 Characteristics of treated clients

According to the data (see Tables 4.1.1., 6.1.1, 6.1.2, 11.1.1 in TDI1 and TDI2, 2010) on the number of the persons treated for psychoactive drug addiction in Croatia the situation is relatively stable. During 2009, 7 733 persons were treated within the health system, and the total number of the treated persons has not changed significantly in the last four years. Out of the total number of the treated persons, 6 251 (80.8%) of them were treated for opiate addiction, whereas 1 482 (19.2%) persons were treated for addiction to some other psychoactive agents. Although in Croatia the number of demands for treatment is stable, yearly data show that the percentage of opiate addiction treatment is increasing, whereas the percentage of treatment of non-opiate addiction is decreasing.

Out of the total number of the treated persons in 2009 (Table 5.1), 921 (11.9%) persons were treated in inpatient treatment, 262 (28.5%) of which were treated for the first time. In outpatient treatment 6 812 (88.1%) persons were included, 1 201 (17.6%) of which were treated for the first time. Out of 1 463 (18.9%) persons treated for the first time (both inpatient and outpatient) 667 (45.6%) asked for help due to opiate addiction, whereas 796 (54.4%) persons came to treatment because of addiction to other drug types. It can be concluded that in Croatia the system for addiction prevention and outpatient treatment has had a significant impact on today's situation, and although drugs in society are getting more and more available and cheaper, more significant rise of the number of addicts has not been recorded.

The distribution of the treated persons by gender did not significantly change in 2009 related to the previous years. According to the data on the gender of treated addicts, the majority of the treated persons were males. Out of the total number of 7 733 treated persons, 83% or 6 417 persons were males and 17% or 1 316 were females. The proportion of the treated men and women is 4.9:1, the same as in the previous year.

Table 5.1 - Number of person in inpatient and outpatient (first and previous) treatment, by gender in 2009

Gender	Inpatient treatment			Outpatient treatment		
	First	Previous	Total	First	Previous	Total
Male	174	524	698	998	4 721	5 719
Female	88	135	223	203	890	1 093
Total	262	659	921	1 201	5 611	6 812
TOTAL	**7 733**					

Source: Croatian Institute of Public Health

The average age of the treated persons in 2009 was 31.1 years, with the biggest number of treated men at the age between 30 and 34 years, whereas the biggest number of women belongs to the age group between 25 and 29 years. The average age of the treated men was 31.2 years and women 30.5 years. The persons treated in inpatient facilities were older than those treated on the outpatient basis, which is opposite from the data in the previous year (TDI1 and TDI2, 2010; TDI1 and TDI2, 2009).

Regarding the educational level (Table 5.2) the highest number of the treated persons has finished secondary school (5 086 – 65.8%). Only 1 830 (23.7%) finished primary school, and 117 persons (1.5%) did not finish primary school. Education and employment present very important elements in the process of treatment, which among others includes help with additional education, retraining and employment of rehabilitated addicts. 432 persons or 5.6% of the total number of treated persons finished a college or university.

Table 5.2 - Persons treated for psychoactive drug abuse in 2009, by educational level and gender

Level of education	Male	Female	Total	%
Primary school not completed	100	17	117	1.5
Primary level of education	1 569	261	1 830	23.7
Secondary level of education	4 238	848	5 086	65.8
Higher education	315	117	432	5.6
Not known/missing	195	73	268	3.5
TOTAL	**6 417**	**1 316**	**7 733**	**100.0**

Source: Croatian Institute of Public Health

Regarding the labour status (Table 5.3) half of the treated persons were unemployed, whereas one third of them were employed. During 2009 there were 7.0% persons included in the educational system.

Table 5.3 - Persons treated for psychoactive drug abuse in 2009, by labour status and gender

Labour status	Male	Female	Total	%
Regular employment	2 183	369	2 552	33.0
Pupil/student	403	136	539	7.0
Economically inactive	311	47	358	4.6
Unemployed	3 299	698	3 997	51.7
Other	25	2	27	0.3
Not known/missing	196	64	260	3.4
TOTAL	**6 417**	**1 316**	**7 733**	**100.0**

Source: Croatian Institute of Public Health

For 7 416 (95.9%) of the total number of 7 733 treated persons we have the information about who they lived with (Table 5.4). Similar to previous years the majority (58.4%) of the treated persons lived with his/her primary family, 11.5% of the treated lived with a partner and a child, 11.1% lived alone and 9.1% with a partner. This again confirms the fact that addicts in Croatia are not expelled from the society and that their primary or secondary family do not abandon them in the moment of their addiction treatment. The information about the large number of the treated addicts living with his/her primary family, although in the age when they should start independent life, does not differ from the mode of residence of the general population of the same age.

Table 5.4 - Persons treated for psychoactive drugs abuse in 2009, by living status and gender

Living status	Male	Female	Total	%
Alone	747	110	857	11.1
With parents	3 918	596	4 514	58.4
Alone with child	28	25	53	0.7
With partner (alone)	492	215	707	9.1
With partner and child(ren)	709	177	886	11.5
With friends	49	24	73	0.9
Other	267	59	326	4.2
Not known/missing	207	110	317	4.1
TOTAL	**6 417**	**1 316**	**7 733**	**100.0**

Source: Croatian Institute of Public Health

For the 5 446 (70.4%) of the total number of 7 733 treated persons we have information about their living status (where they lived) (Table 5.5). More than half (59.7%) of the treated persons had stable accommodation, 8% have unstable accommodation and 2.7% of the treated persons live in institutions, i.e. prison or a clinic.

Table 5.5- Persons treated for psychoactive drug abuse in 2009, by living status (where) and gender

Living status	Male	Female	Total	%
Stable accommodation	3 907	713	4 620	59.7
Unstable accommodation	467	152	619	8.0
In institutions (prison, clinic)	180	27	207	2.7
Not known/missing	1 863	424	2 287	29.6
TOTAL	**6 417**	**1 316**	**7 733**	**100.0**

Source: Croatian Institute of Public Health

Out of the total number, 4 263 (55.1%) of treated persons were self-referred to the treatment (Table 5.6). For the majority of the persons treated on an inpatient basis (71.1%) the motivation for treatment is unknown, whereas the same information is known for almost all persons treated on an outpatient basis (98.9%). Most of the persons treated on an outpatient basis (60.0%) were self-referred. Court/State's Attorney's Office referred to treatment 13.5% persons treated on an outpatient basis. In the same way 29.9% of the persons treated for the first time on an outpatient basis were referred to treatment, whereas 28.6% of them chose self-referral (Tables 5.1.1 in TDI1 and TDI2, 2010).

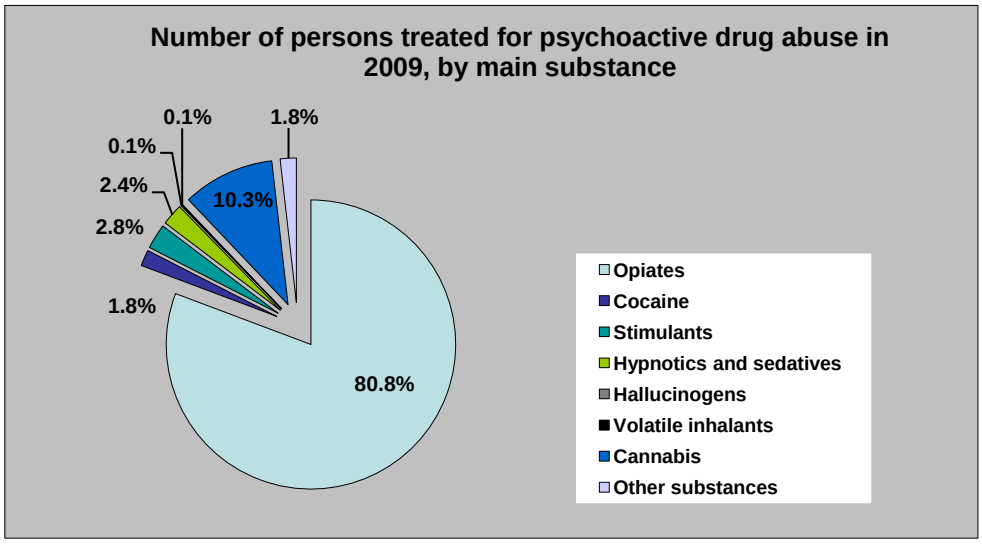
Table 5.6 - Persons treated for psychoactive drug abuse in 2009, by gender and source of referral

Source of referral	Male	Female	Total	%
Self referred	3 515	748	4 263	55.1
Family/friends	495	116	611	7.9
Other drug treatment centre	111	16	127	1.6
General practitioner	558	123	681	8.8
Hospital/other medical source	68	14	82	1.1
Social services	137	26	163	2.1
Court/probation/police	861	75	936	12.1
Other	123	18	141	1.8
Not known/missing	549	180	729	9.4
TOTAL	**6 417**	**1 316**	**7 733**	**100.0**

Source: Croatian Institute of Public Health

The motivation for going to psychoactive drug addiction treatment was different for different kinds of drugs (source: CIPH, 2010). Most persons treated for opiate abuse are mostly self-referred (65.8%). General practitioners referred opiate addicts to treatment in 10.5% of the cases, court and police accounted for 5.5% of them. Although parents learn about non-opiate use very early, mostly in the first year of abuse, they do not take it as a worrying fact and a reason for going to treatment. Regarding the non-opiate use, 39.8% of the cases were referred to treatment by court, police or it is a suspended sentence and 10.4% of the treated persons started treatment referred by the family, whereas 9.6% came to treatment self-referred. The Social Welfare Centre referred to treatment 9.2% of the persons.

Figure 5.1- Persons treated for psychoactive drug abuse in 2009, by main substance



Source: Croatian Institute of Public Health

The largest number of persons was treated for opiates as a main substance (80.8%), then for cannabinoids abuse (10.3%) (Figure 5.1.) Among persons treated for cannabis addiction 62.8% were in the treatment for the first time, while 10.3% of opiate addicts were treated for the first time in 2009. Cocaine was cited as the main reason for entering treatment by 1.8% of all drug treatment clients in 2009. Among cocaine addicts 35.7% entered treatment for the first time in their life. Similarly, amphetamine was primary drug for 1.8% of all treated persons. 35.8% of amphetamine addicts were treated for the first time and majority of these clients were in the treatment system before. The majority of the clients were treated on an outpatient basis (90.6% of opiate addicts, 88.8% of cocaine addicts, 98.5% of amphetamine addicts and 93.9% cannabis addicts) (Tables 11.1.1., TDI1 and TDI2, 2010).

Table 5.7 -Persons treated for psychoactive drug abuse in 2009, by age and main substance

Main substance	Age									Total	%
	<15	15-19	20-24	25-29	30-34	35-39	40-44	45-49	>50		
Opiates	0	77	591	1671	1895	1099	504	301	113	6251	80.8
Cocaine	0	16	47	40	22	6	9	3	0	143	1.8
Stimulants	0	44	90	61	14	3	1	1	0	214	2.8
Hypnotics and sedatives	1	12	10	15	22	15	28	28	54	185	2.4
Hallucinogens	0	0	0	1	1	1	0	0	1	4	0.1
Volatile inhalants	0	1	3	1	0	2	0	0	0	7	0.1
Cannabis	9	332	265	117	44	19	4	3	0	793	10.3
Other substances	3	12	22	24	26	18	14	9	8	136	1.8
TOTAL	**13**	**494**	**1028**	**1930**	**2024**	**1163**	**560**	**345**	**176**	**7733**	**100.0**

Source: Croatian Institute of Public Health

From the data on the main addiction substance and age (Table 5.7) it is clear that at the age of 20 the youth come to treatment mostly due to addiction to cannabinoids, or 341 (67.3%) of

them. Cocaine, ecstasy and other psychostimulating substances were mostly used by persons between the ages of 20 to 30. 72.0% of persons treated for cocaine addiction were under 30. Almost half (41.6%) of the amphetamine addicts were between 20 and 24 years old.

By analysing the data modalities of usage of the main substance (TDI1 and TDI2, 2010) it is clear that the most dominant mode of opiate usage is still intravenous opiate use. 4 255 heroin clients (68.9% out of the total number of heroin clients) have taken heroin intravenously, followed by sniffing (20.5%) and smoking (4.5%). Compared to 2008 a slight decrease of intravenous heroin addicts can be noticed and an increase of persons who sniff heroin. Out of the total number of the treated persons 4 264 (55.1%) administered drugs intravenously, whereas 1 528 (19.6%) of clients mentioned sniffing and 1 081 clients (14.0%) mentioned smoking as the main route of drug administration. The main route of administration for cannabinoids addicts was smoking, while sniffing was the main route for cocaine addicts. Among cocaine addicts no one mentioned injecting as the main route of administration. 83.2% of amphetamine clients mentioned sniffing, and 14.6% indicated eating or drinking as the main route of amphetamine administration (Tables 17.1.1, TDI1 and TDI2, 2010).

According to the data on the frequency of the main substance use (Tables 20.1.1, TDI1 and TDI2, 2010), 63.9% of heroin addicts have not used it the month before entering treatment, and 15% of them were taking it on a daily basis. Among cannabinoids clients 57.9% were occasional users (or have not used it the month before entering treatment), 19.4% used it once a week, and 5.7% persons consumed cannabinoids daily. Cocaine was not used in the last month by 74.1% of the cocaine clients, and 7% were taking cocaine once a week or less. Similarly, amphetamine was not used in the last month by 78.8% amphetamine clients, and 13.1% mentioned used amphetamines once a week or less. It can be said that of all substances heroin, methadone and other opiates have been taken the most frequently.

Table 5.8 - Persons treated for psychoactive drug abuse in 2009, according to type of treatment

Type of treatment	Opiates abuse		Non-opiates abuse		Total	
	Number	%	Number	%	Number	%
Short-term methadone detoxification	136	2.5	0	0.0	136	2.1
Slow methadone detoxification	813	15.0	0	0.0	813	12.5
Methadone maintenance treatment	1 520	28.0	0	0.0	1 520	23.3
Buprenorphine pharmacotherapy	2 292	42.2	0	0.0	2 292	35.2
Naltrexone pharmacotherapy	59	1.1	0	0.0	59	0.9
Detoxification without methadone	106	2.0	12	1.1	118	1.8
Without medicaments	210	3.9	211	19.5	421	6.5
Instructions. counseling. support	256	4.7	848	78.4	1 104	17.0
Refer to other centre	19	0.3	4	0.4	23	0.4
Treatment is not started – Decision is not brought	21	0.4	6	0.6	27	0.4
TOTAL	**5 432**	**100.0**	**1 081**	**100.0**	**6 513**	**100.0**

Source: Croatian Institute of Public Health

Out of the total number of the treated persons the treatment modality is known for 6 513 (88.2%) of them. Table 5.8 shows the types of treatment for the persons for whom the

treatment type is known. According to the drug addiction treatment modalities in 2009, 15.0% of opiate users underwent slow, and another 28.0% methadone maintenance treatment. Fast methadone detoxification is present in 2.5% of opiate users. After the process of fast methadone detoxification, this proportion of clients regularly undergoes another type of treatment[25]. Buprenorphine pharmacotherapy is more and more represented and 42.2% of treated opiate users (for whom the treatment modality is known) underwent the buprenorphine therapy, thanks to the fact that since 2006 the Croatian Institute for Health Insurance covers the costs of this kind of treatment.

Compared to the total number of the treated persons, 4 684 (60.6%) persons were on some type of opiate substitution therapy. Among opiate addicts 74.9% were treated by pharmacotherapy out of which 2 333 (49.8%) persons were on methadone substitution therapy (slow methadone detoxification and methadone maintenance treatment) and 2 292 (48.9%) were on buprenorphine therapy (ST 24, 2010). Among pharmacologically treated persons 1.3% was on naltrexon therapy. As for the persons treated for non-opiates the psychosocial interventions (counselling techniques, psychotherapy and other forms of psychological support) were most often used.

Polydrug use was present with a large number of drug users, but registration rules require the identification of the "main substance" according to the level of addiction, frequency of use or its consequences. Therefore, a therapist defines which substance is the main reason for coming to treatment. Among 6 251 opiates addicts more than a half (58.5%) were polydrug users. Among them, 31.8% used cannabinoides, 27.4% cocaine, 20.7% some other opiate substance, mostly methadone, and 8.9% used MDMA and other derivates. Among 143 cocaine addicts, 114 (79.7%) were polydrug users. 38.6% of these polydrug users mentioned amphetamines and 36% cannabinoides as a secondary drug. 64% persons out of 214 stimulants addicts mentioned amphetamines as a primary drug. Among them, 127 (92.7%) persons were polydrug users and 71.7% of them used cannabinoides, 22.8% used MDMA and other derivates and 3.1% used cocaine as a secondary drug (Tables 24.1.1., TDI1 and TDI2, 2010).

Table 5.9 - Persons treated for psychoactive drug abuse in 2009, by injecting behaviour and gender

Injecting behaviour	Male	Female	Total	%
Ever injected, but not currently	3 368	689	4 057	52.5
Currently injecting (last 30 days)	1 002	190	1 192	15.4
Never injected	1 825	328	2 153	27.8
Not known/missing	222	109	331	4.3
TOTAL	**6 417**	**1 316**	**7 733**	**100.0**

Source: Croatian Institute of Public Health

The data on injecting behaviour (Table 5.9) show that 52.5% of all treated persons injected drugs in their lifetime, but did not inject at the moment of treatment. The percentage is almost the same for males and females. In the last 30 days before entering treatment 15.4% of treated addicts injected drugs. Among treated persons 27.8% have never used drugs intravenously. Analysis of data on injecting behaviour among first treatments (Tables 25.1.2., TDI1 and TDI2, 2010) shows that more than a half (56.7%) of them have never injected drugs, 14.8% injected drugs in their lifetime, but not currently and 12.6% of persons

[25] Aforementioned is the reason why these clients are not considered in ST 24.

injected drugs in the last 30 days before entering treatment. Addicts mostly injected opiates (heroin, methadone, and other opiates), 0.2% of them injected other drugs (cocaine, stimulants, hypnotics and sedatives) (Tables 26.1.1., TDI1 and TDI2, 2010).

According to data on the total number of treated persons per 100 000 people (aged from 15 to 64) in the Croatian counties in 2009, the Istria County had the highest rate of treated persons (572.7). The Zadar County was the second (517.2), then the City of Zagreb (420.9), the Dubrovnik - Neretva County (381.2), the Šibenik - Knin County (347.0), the Split - Dalmatia County (330.7) and Primorje - Gorski Kotar County (308.2). All the other counties are below the Croatian average. The rate of treated persons in the Republic of Croatia amounts to 258.9 of treated persons per 100 000 of adult population (in 2008 the rate of treated persons amounted to 251.4 and in 2007 the rate amounted to 250.3). According to data on opiate addicts the rate is also higher than the year before. The Istria County has the highest rate (529.0) of persons treated for opiate addiction per 100,000 people (aged 15-64), then the Zadar County (482.3), the Šibenik - Knin County (323.2), the City of Zagreb (317.3), the Dubrovnik - Neretva County (316.4), the Split - Dalmatia County (298.1) and Primorje - Gorski Kotar County (289.9). The rate in the other counties is lower than the rate for the Republic of Croatia which amounts to 209.2 persons treated for opiate addiction per 100 000 people of working age (Katalinić, 2010).

The process of integration of the data on therapeutic community users into the health system is being carried out. In 2009, 1 137 persons underwent the treatment in therapeutic communities (Table 5.10). Out of the total number of the persons, 1 066 (93.8%) opiate addicts underwent the treatment in therapeutic communities. 544 (47.8%) of the persons were included in the treatment for the first time. Among them there were 502 new opiate addicts and 42 new consumers of other drugs. By observing the gender structure of the users it is noticeable that 884 (77.7%) of persons were males and 253 females (22.3%). Among opiate addicts there were 820 (76.9%) males and 246 (23.1%) females; among the new opiate addicts there were 407 (81.1%) males and 95 (18.9%) females; among the users and addicts of other drugs there were 64 (90.1%) males and 7 (9.9%) females, and among the newly reported users and addicts of other drugs 38 (90.5%) males and 4 (9.5%) females.

Table 5.10 - Number of opiate addicts, addicts and consumers of other drugs and persons treated in 2009 for the first time in the treatment of the Therapeutic Communities, by gender

Number of opiate addicts, addicts and consumers of other drugs in TC treatment and number of treated persons for the first time	Moji dani Dom za ovisnike Đurmanec		San Lorenzo – Zajednica Cenacolo		Dom za ovisnike Zajednica Susret		Zajednica Mondo Nuovo		Zajednica Reto Centar – Prijatelj Nade		Zajednica pape Ivana XXIII		NE-ovisnost	
	M	F	M	F	M	F	M	F	M	F	M	F	M	F
Number of opiate addicts in TC treatment	40	0	182	60	137	51	31	0	374	111	38	24	18	0
Number of addicts and consumers of other drugs	21	0	0	0	2	0	5	0	3	7	0	0	33	0
Number of opiate addicts treated for the first time in TC	3	0	71	17	91	24	15	0	203	46	14	8	10	0
Number of addicts and consumers of other drugs treated for the first time	1	0	0	0	1	0	3	0	1	4	0	0	32	0
Total number of addicts in TC treatment by gender	61	0	182	60	139	51	36	0	377	118	38	24	51	0
	61		242		190		36		495		62		51	
Total number of persons in treatment	**1 137**													
Total number of persons treated in TC for the first time by gender	4	0	71	17	92	24	18	0	204	50	14	8	42	0
	4		88		116		18		254		22		42	
Total number of first time treated persons in TC	**544**													

Source: Therapeutic Communities

As for the number of addicts referred to rehabilitation and abstention treatment abroad by mediation of the associations for combating drugs abuse and therapeutic communities in 2009 there was a considerable fall compared to 2008. In 2008 there were 130 persons referred to abstention treatment abroad, whereas in 2009 there were 117 of them (Table 5.11). So, the decrease of the number of addicts referred to abstention treatment abroad in 2009 compared to 2008 amounts to 10%.

Table 5.11 - Number of persons referred to treatment abroad and number of families involved in counselling sessions in 2009

NGO/Therapeutic Community	Total number of persons sent abroad		Number of families involved in counselling sessions
	Male	Female	
Zajednica "Ne ovisnost"	0	0	51
Zajednica "Mondo Nuovo"	6	0	100
Dom za ovisnike "Zajednica Susret"	0	0	517
Dom za ovisnike "Moji dani"	0	0	103
San-Lorenzo-Zajednica Cenacolo	20	17	242
Reto-Centar-Prijatelj nade	12	0	60
Nada	0	0	51
Zajedno idemo dalje	0	0	90
Dedal	0	0	607
Porat	1	1	60
PET+	0	0	4
Novi život	17	3	9
UPO	3	4	52
Udruga roditelja "Zajednica Susret"-Rijeka	0	0	91
Osmijeh	0	0	82
Udruga roditelja "San Patrignano"	12	5	57
Centar za duhovnu pomoć	0	0	90
Terra	0	0	90
Papa Ivan XXIII	11	5	150
TOTAL	**82**	**35**	**2 506**
	117		

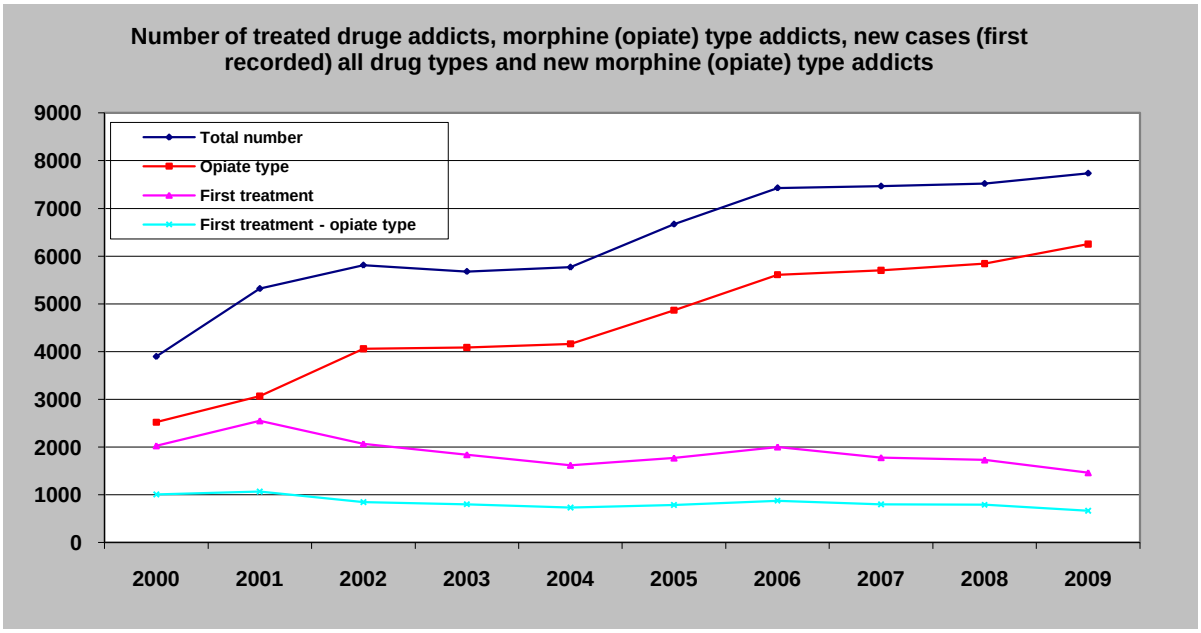
Source: Non-governmental organizations and Therapeutic Communities

5.4 Trends of clients in treatment

According to the data (Figure 5.2) on the number of persons treated for psychoactive drug abuse in the Republic of Croatia in the observed period from 1995 – 2009, it is obvious that the situation regarding drug addiction treatment is stable. In the observed period the number of treated persons within the health system was increasing. The number of persons treated for the first time for some kind of addiction started falling after its continuous rise till 2001, so in the years following, a smaller total number of persons treated for the first time for psychoactive drugs addiction was recorded, whereas the number of the persons treated for the first time for opiate addiction was stable after the year 2001. Such trends indicate that the treatment system organised in the Services for Addiction Prevention and Outpatient Treatment had an important impact on today's epidemiological addiction situation in Croatia. Addicts stay in the treatment system longer, and the number of the new ones stagnates despite the fact that drugs in our society are more and more available and cheaper.

The number of persons treated in the health system for the first time decreased between 2002 and 2004 and after that it increased in the period to 2006. The number of persons who entered the treatment for the first time decreased again in the last three years. In 2009 there were 7 733 treated persons, out of which 1 463 were treated for the first time. This is the smallest percent (18.9%) of persons treated for the first time in the last 10 years and compared to the previous report period it decreased by 13.9%. At the same time the number of treated persons increased which means that «old» addicts apply for treatment more and that there are less new addicts.

Figure 5.2 – Number of treated drug addicts (ICD-10, F11.-, F19.-), morphine (opiate) type addicts, new cases (first recorded) all drug types and new morphine (opiate)-type addicts in Croatia 1995-2009

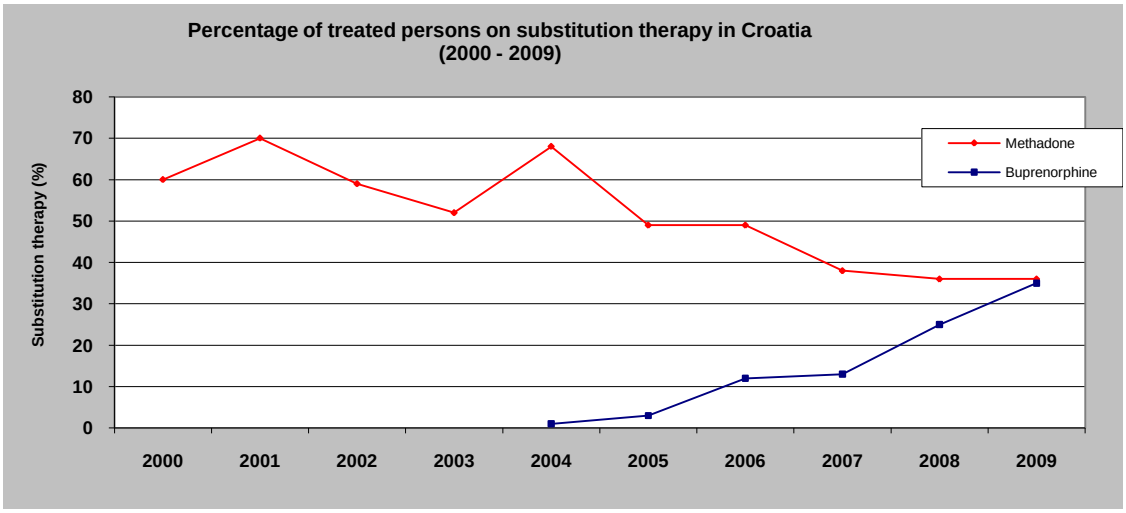


Source: Croatian Institute of Public Health

Methadone substitution therapy for addiction treatment in Croatia has been used since 1991(Figure 5.4), whereas the controlled application of methadone was established by the first National Strategy on Combating Narcotic Drugs Abuse in 1996. The data on persons treated for any kind of substitution therapy (fast detoxification, slow detoxification, maintenance) have been collected in the Registry of Persons Treated for Psychoactive Drugs Abuse. The data registered in the observed period from 2000-2009 show that Methadone as a substitute is less and less represented in addiction treatment. By introducing

the buprenorphine substitution in 2004 and after the financing of treatment costs has been legally regulated (since 2006 CIPH covers the treatment costs) more and more addicts choose that kind of treatment, so the percentage of buprenorphine treatment has been steadily rising.

Figure 5.3 - Percentage of treated persons on substitution therapy in Croatia (2000-2008)



Source: Croatian Institute of Public Health

The analysis of data on persons treated in the health system in 2009 in the Republic of Croatia shows that the situation is still relatively stable and that the number and characteristics of the treated persons did not change significantly. The total number of treated persons increased by 3% compared to the previous year which indicates that addicts remain in the system under the supervision of medical and other professional workers.

Table 5.12 - Persons treated for psychoactive in the period 1999-2009

Year	Number of treated persons	Opiate addiction		Non-opiate addiction	
		Number	%	Number	%
1999	3 048	2 057	67.5	991	32.5
2000	3 899	2 520	64.6	1 379	35.4
2001	5 320	3 067	57.7	2 253	42.3
2002	5 811	4 061	69.9	1 750	30.1
2003	5 678	4 087	72.0	1 591	28.0
2004	5 768	4 163	72.2	1 605	27.8
2005	6 668	4 867	73.0	1 801	27.0
2006	7 427	5 611	75.5	1 816	24.5
2007	7 464	5 703	76.4	1 761	23.6
2008	7 506	5 832	77.7	1 674	22.3
2009	**7 733**	**6 251**	**80.8**	**1 482**	**19.2**

Source: Croatian Institute of Public Health

Observations over the years indicate that there are more and more opiate addicts in the treatment system. The proportion of the opiate addicts has amounted to more than 70% since 2003, whereas in 2009 it was 80.8%. Compared to the year before, it represents a 3.1% rise which has been the largest proportion in the last 10 years (Table 5.12). More non-opiate than opiate addicts enter the system every year, but since opiate addiction demands

longer treatment and care, they remain in the system for more years so there are more opiate addicts in the treatment per year. The number of new opiate addicts, which most precisely reflects the trends of heroin addiction, was for the first time in 2009 smaller than 700 (667). Requests for treatment indicate not only the demand but also trends of drug consumption and according to the data heroin addiction has been stagnant for the last few years.

Addict population in Croatia is getting older and the average age of treated persons (male and female) shows a growing trend. For the first time the age of treated women has been higher than 30 years of age (30.5). Average age of men is usually 31.2. In the last 5 years the average age has increased by 2.8 years. (Table 5.13).

Table 5.13- Average age of persons treated for psychoactive drug abuse in the period 2005- 2009, by gender

Year	Average age		
	Male	Female	Total
2005	28.4	28.1	28.3
2006	29.0	28.7	28.9
2007	29.8	29.2	29.7
2008	30.1	29.5	30.0
2009	31.2	30.5	31.1

Source: Croatian Institute of Public Health

The data on the average age of crucial points of addictive behaviour show the developmental course of addiction. The youth experiment with psychoactive agents at the age of around 16 (in 2008 15.9 years), the first heroine intake happens at the age of around 20 years (20.3 years), the first intravenous heroin administration a year later (21.2 years), and an average age of the first heroin addiction treatment is at 26.2 years. So, from first experimenting with drugs to coming to treatment an intolerable period of 10 years has passed (Table 5.14).

Table 5.14 - Persons treated for psychoactive drug abuse by average age of the first substance administration (2002-2009)

Average age of the opiate addict	Year							
	2002	2003	2004	2005	2006	2007	2008	2009
First administration of any substance	16.0	16.0	16.1	16.1	15.9	15.9	15.9	16.0
First heroin administration	19.9	20.0	20.0	19.9	20.0	20.0	20.1	20.3
First I.V. administration	20.4	20.5	20.8	20.8	20.8	20.8	20.9	21.2
First treatment	24.9	25.0	27.3	27.4	25.5	25.7	26.0	26.2
Number of years between first use and first treatment	8.9	9.0	11.2	11.3	9.6	9.8	10.1	10.2

Source: Croatian Institute of Public Health

Decreasing trend of cannabioids users in the health system is still present and the average age of the first administration show a slight increase (Table 5.15). The average age of first cannabinoids intake was 16.4 years (16.3 in 2008), and an average age of the first treatment was 21.4 years (21.0 in 2008). The age of the first treatment is usually connected

with avoiding the initiation of criminal proceedings for possession of a certain amount of drugs, in most cases due to the intervention of the Social Welfare Centre under the order the County State's Attorney's Office.

Table 5.15 - Persons treated for cannabinoids addiction, by average age of the first substance administration (2002-2009)

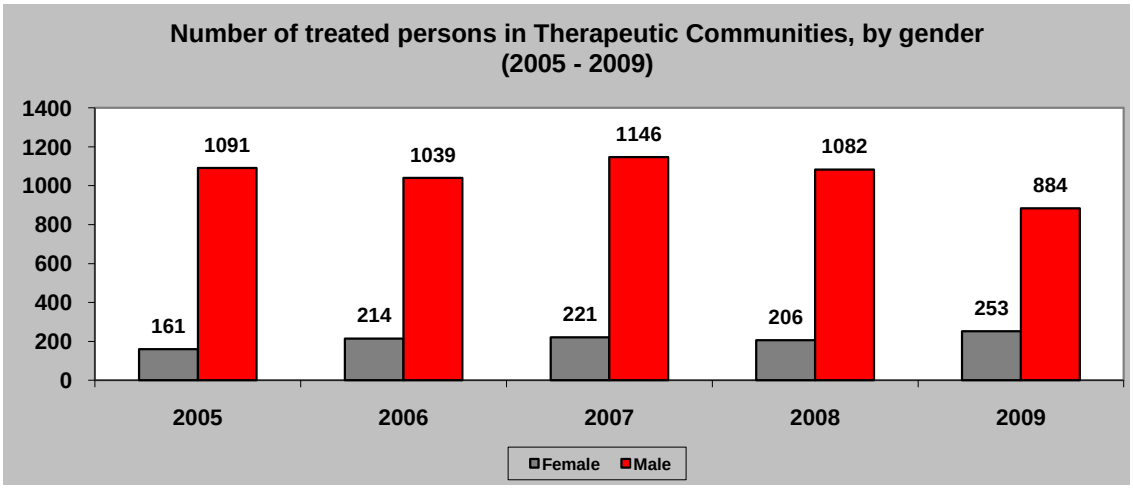
Cannabinoids addicts	Year							
	2002	2003	2004	2005	2006	2007	2008	2009
First administration of any substance	16.0	15.9	16.0	16.1	16.3	16.6	16.2	**16.4**
First cannabinoids administration	16.1	16.1	16.1	16.2	16.4	16.6	16.3	**16.4**
First treatment	18.9	19.0	19.3	19.6	19.8	20.5	21.0	**21.4**
Number of years between first use and first treatment	**2.9**	**3.1**	**3.3**	**3.5**	**3.5**	**3.9**	**4.7**	**5.0**

Source: Croatian Institute of Public Health

Heroin addiction has been gradually replaced by cocaine and amphetamine addiction i.e. abuse which demands a different approach and treatment. Compared to 2008 there were more persons treated for amphetamine abuse. In 2008 there were 67 persons or 0.9% of the total number of treated persons, while in 2009 there were 137 persons or 1.8%. Changes in abused drugs and ways of taking drugs will inevitably lead to changes in demands for therapy, methods of treatment and procedures.

Total number of addicts who underwent withdrawal and rehabilitation in therapeutic communities in 2009 was 1 137 out of which 884 men and 253 women, which is smallest number since 2005. Compared to 2008 it decreased by 11.7% and compared to 2007 by 16.8%. Namely, in 2008 there were 1 288 addicts in withdrawal in the therapeutic communities out of which 1 082 male and 206 female, and in 2007 there were 1 367 persons in the treatment out of which 1 146 male and 221 female addicts (Figure 5.4). Furthermore, according to data acquired from the therapeutic communities, the number of first time treated in the therapeutic communities in 2009 was 544. Compared to 2008, when the number was 646 first time treated, it decreased by 15.8% and compared to 2007 it decreased by 7.2% (Figure 5.5)

Figure 5.4 - Number of treated persons in Therapeutic Communities, by gender 2005 – 2009



Source: Therapeutic Communities

It is important to note that in the afore mentioned three-year period, data on the number of addicts treated in the therapeutic communities had been collected from 7 therapeutic communities, and that the number mentioned cannot be considered complete, but should be considered as an indicator of the number of addicts undergoing the withdrawal in the therapeutic communities and not as final epidemiological data.

Regarding that in 2008 the number of 130 persons were referred to rehabilitation and abstention treatment abroad, it is noticed that the number of addicts who were referred abroad by mediation of the associations for combating drug abuse and therapeutic communities in 2009 decreased by 10%.

According to data collected by the OCDA, in 2009 associations provided some kind of help for 453 addicts and sporadic drug consumers. Among them 372 were opiate addicts out of which 102 were first time treated. In 2009, 2 506 addicts' families were provided counselling by therapeutic communities, which is a decrease of 7.5% compared to 2008 when counselling was provided for 2 710 families. When compared to 2008, when associations provided certain kind of help and treatment for 1 777 addicts, there was a significant decrease of 74.5% in the number of addicts who received some kind of help. Possible reasons for the smaller number of persons who were provided some kind of help is a greater orientation of some associations on preventive and not therapeutic activities as well as the problem of associations not submitting data. Namely, in 2009 only 12 associations submitted the data on the number of persons and kind of help they provided to addicts, drug consumers and their families unlike in 2008 when the data was submitted by 20 associations.

6 Health correlates and consequences

Risk behaviors of addicts include every kind of behavior related to basic disease, which can also lead to additional diseases and complications. These behaviors include common use of needles, syringes and other equipment as well as risk (promiscuous, without protection) sexual behavior. Hepatitis B, C and HIV are just some of infectious diseases that can be transmitted in these ways, meaning that addict population is at much greater risk of contracting a disease than general population. It should also be noted that this chapter refers not only to the prevalence or incidence of diseases, but also risk factors for their transmission. Therefore, it is of utmost importance to insist on implementation of measures that could lower common use of needles and other equipment, and continually raise awareness about importance of safe sex.

Data gathered through standard report forms enable the insight into ways of using drugs in general, as well as frequency of use of common equipment. Such data collection enables monitoring of changes in behaviour and attributes of addict population. Total quality and regularity of data gathering through standard forms is improving.

Data on intravenous opiate use are recorded for a month before last examination and are monitored in accordance with data on lifetime prevalence of intravenous opiate use. In 2009, out of total number of opiate addicts treated in current year, 5 228 (83.6%) reported that they have injected opiates at least once in a lifetime, while 960 (15.4%) injected opiates in month before treatment. Only 63 registered addicts reported to never have injected any opiates.

It is important to mention that harm reduction needle exchange program was provided, in cooperation with Croatian Red Cross, in Zagreb, Zadar and Nova Gradiška. For area of City of Krapina and Zabok, the cooperation with Krapina Red Cross was continued. Also, the program is provided in Split, Rijeka, Pula and Istria, Dubrovnik - Neretva and Osijek - Baranja County in cooperation with NGOs “Let”, “Terra”, “Institut” and “Help”. Cooperation with “Help” has spread to Vukovar Srijem and Šibenik Knin counties, and with “Terra” to Karlovac County.

There are continuous activities of free and anonymous testing of addicts for B and C Hepatitis and HIV infections, and are implemented in cooperation with Infectious Diseases Clinic “Dr. Fran Mihaljević”, Public Health Institutes of Primorje - Gorski Kotar, Split - Dalmatia, Dubrovnik - Neretva, Osijek - Baranja, Brod - Posavina and Zadar Counties, as well as the City of Zagreb. Croatian Public Health Institute also performed testings in prison institutions in Bjelovar, Karlovac, Sisak, Varaždin, Zagreb and Prison Hospital in Zagreb.

6.1 Drug-related infectious diseases

Prevalence of drug related infectious diseases in the population of injecting drug users is being routinely monitored since the middle of the 80's and the results indicate a continuously low level of HIV infection (below 1%) and relatively high prevalence of hepatitis B (around 30%) and hepatitis C (40-60%). Looking only at the figures it is obvious that is extremely important to reduce the sharing of needles, syringes and other equipment, as well as risky sexual behaviour. From this reason every patient entering Services for Drug Addiction Prevention and Outpatient (Service) is asked about sharing of equipment and warned about the dangers thereof on every visit.

Since all blood donors are routinely tested for hepatitis C in Croatia, the basic possibilities of infection stem from intravenous drug use, promiscuous and unprotected sex, and occupational diseases (needle-stick incidents). In harm reduction programmes, every active

injecting drug user is warned to take all the necessary precautions against HIV/AIDS and hepatitis infection. This includes the use of clean and sterile equipment (syringes and needles) for drug use, and condoms during sex. According to the current estimates, over 60% of new infections appear in persons who injected illicit drugs up to six months prior to the appearance of the first symptoms.

Table 6.1 – Persons treated for drug addiction according to needle and syringe sharing in the lifetime and in the last month (2003-2009)

Needle and syringe sharing in lifetime (%)							
	2003	2004	2005	2006	2007	2008	2009
Yes	70.4	71.5	71.3	70.7	70.2	68.0	68.1
Needle and syringe sharing in the last month (%)							
	2003	2004	2005	2006	2007	2008	2009
Yes	33.1	28.6	23.0	21.6	19.9	17.8	20.7

Source: Croatian National Institute of Public Health

In monitored period of 2002–2009, the number of Hepatitis B and C positive treated addicts is on the decline.

Table 6.2 - Persons treated for drug addiction, according to anamnesis data on hepatitis B, C and HIV infections (2003-2009)

Opiate addicts	2003	2004	2005	2006	2007	2008	2009
HIV positive	0.7	0.5	0.7	0.5	0.5	0.5	0.5
Hepatitis B positive	27.0	19.2	17.6	15.5	13.6	13.2	10.5
Hepatitis C positive	72.3	47.4	47.6	46.2	46.3	44.6	42.3

Source: Croatian National Institute of Public Health

Share of addicts infected with Hepatitis C is still high, many times higher than estimates for general population, but in relation to 2008, it has lowered for about 2%, and is now 42.3%. There are almost 3% fewer cases (10.5% total) of Hepatitis B positive addicts. Share of HIV positive persons is very low and stable for a longer period of time, and is the same for 2009, as it was for last year, only 0.5%, primarily thanks to permanent education, providing of relevant information, modern pharmacotherapy, work of Counseling Centers and Needle and syringe exchange programs.

Treatment of persons included in Addiction Prevention Services therapy includes regular urine testing (quick tests) for presence of drugs and their metabolites, as well as capillary blood testing, for HIV, HCV, HBV and syphilis if patient behaved in risky manner (common equipment use and unprotected sexual relations). There were total of 27 331 urine tests, which is 2 278 tests per month. Most testing was conducted in the City of Zagreb (7 398), Split-Dalmatia County (5 485), Zadar County (3 082) and Istria County (2 246). Blood testing was conducted less frequently. In 2009, 1 292 tests were performed, or 108 per month. Most testing was conducted in Primorje Gorski Kotar County (276), then Split-Dalmatia County (265), Dubrovnik – Neretva County (258) and City of Zagreb (251).

During 2009, there were 2 260 persons in treatment for psychoactive drugs use in the City of Zagreb, which makes 29.2 % of all treated patients in Croatia. As in the year before, the City of Zagreb is one of the counties with the highest rate of treated persons for drug abuse per 100,000 people (15-64 years old). In 2009, this rate was higher for Zagreb than for the whole country (Zagreb – 420.9; Republic of Croatia – 258.9). Relating to other counties, Zagreb has

the third highest rate, after Istria (572.7) and Zadar (517.2) counties. Of all persons treated who live in the City of Zagreb, 1 704 came for using opiates (75.4%), which is less than the rate for the whole country (80.8% treated for opiates). In 2009, number of persons treated for opiates increased in Zagreb, with only Istria and Zadar counties with higher rates than the capital.

Data on type of psychoactive drugs in Zagreb do not differ much from those for Croatia. In Zagreb, most persons are treated for opiate addiction 75.4%, in Croatia 80.8%. The second most common main drug is cannabis, In Zagreb (11.8%) as well as Croatia (10.3%). Stimulants were used by 4.3% of users in Zagreb, and 2.8% in whole Croatia. Also, use of cocaine was larger than in the whole country (Zagreb – 3.6%; Republic Croatia – 1.8%). Out of 153 persons who mentioned cocaine as a main substance of use, 82 live in Zagreb. This confirms data from 2008, which noted that Zagreb has the higher rate of addicts who attend treatment for abuse of cocaine, cannabionids and stimulants.

Almost 70% of treated persons who live in Zagreb shared needles at least once in their lifetime (959 or 67.1%), and in the last month 82 persons did the same thing (16.3%) In Croatia, the rate for lifetime prevalence is 68%, and for the last month 20.7%.

Table 6.3 - Drug addicts residing in the City of Zagreb treated in 2009, according to anamnesis data on hepatitis B, C and HIV infections

Opiate abuse	City of Zagreb (%)	Croatia(%)
HIV positive	0.5	0.5
Hepatitis B positive	5.5	10.5
Hepatitis C positive	31.5	42.3

Source: Croatian National Institute of Public Health

Among opiate addicts in the City of Zagreb who are tested for virus presence, most people were hepatitis C positive (31.5% in Zagreb, 42.3% in Republic of Croatia). The rate for hepatitis B is also smaller in Zagreb (5.5%) than in the whole country (10.5%). The City of Zagreb, as well as Croatia still has extremely low rates of HIV infection carriers (0.5%).

As oppose to 2008, when the second Seroprevalence study of HIV, Hepatitis B and C was conducted among injecting drug users (IDU) in Osijek, Zadar and Dubrovnik counties outside the routine monitoring of infectious diseases, this wasn't the case in 2009. The new study will take place in 2011.

However, a new survey, named "Viral hepatitis B, C and HIV infection in Croatian prisons" (Burek, Horvat, Butorac, Mikulić) was published this year. The survey was conducted among prison population and persons in custody, but also among correctional staff, since they are potential risk groups for occupationally acquired infections with blood borne pathogens, in 20 prisons throughout Croatia. Juveniles (less than 18 years of age), were also included in the survey.

The survey was carried out between December 2005 and December 2007 and comprised of two parts: a questionnaire and the collection of blood samples. Staff and prisoners were briefed in advanced, and were advised that the survey was voluntary, anonymous and confidential. The questionnaire consisted of questions relating to demography, prison sentence, risk behaviours self reported hepatitis and HIV testing and hepatitis B vaccination. It was self administered and took about five minutes to complete. Blood samples were collected with the appropriate device and transported to the laboratory on the same day. Serological markers used for HBV infection were as follows: HBsAg, anti-HBc, anti HBs and IgM anti HBc. For HCV infections markers used were anti HCV and HCVAg-Ab.

The survey was conducted on 3 348 adults (3 160 men and 188 women), 144 juveniles (130 men,14 women) and 259 members of correctional staff (201 men and 58 women), which represents 32.9% of total adult prisoner population, 72.9% juvenile prison population and 10.9% of total prison staff. A total of 654 prisoners gave blood twice. The first blood sample was taken 3 months after entry to prison, and the second one in the period of next 3 to 6 months. The median range of respondents was 32 years for adults and 18 years for juveniles.

The most prevalent risk group for adults was the IDU group (24.3%), while relatively high percentage was noted in the alcoholic (11.9%) and highly promiscuous (8.2%) groups. Adult males comprised the highest percentage in the IDU group (24.7%). Contrary to adults, the most prevalent high risk group in juveniles was the highly promiscuous group (22.9%), while the alcoholic (13.2%) and IDU (12.5%) groups had similar percentage.

Table 6.4 – Structure of the adult prison population according to risk groups and gender

	Total		Male		Female	
	Number	%	Number	%	Number	%
IDU (Injecting Drug users)	815	24.3	779	24.7	36	19.2
Highly promiscuous	275	8.2	251	7.9	24	12.7
MSM (men having sex with men)	8	0.2	8	0.2	0	0
Alcoholics	397	11.9	386	12.2	11	5.9
Personality aberration	195	5.8	188	6.0	7	3.7
Psychiatric disorder	96	2.9	84	2.7	12	6.4
PTSD (Post-traumatic stress disorder)	31	0.9	31	0.9	0	0
Non-IDU	54	1.6	49	1.6	5	2.7
At no risk	1404	41.9	1333	42.2	71	37.8
No response	73	2.2	51	1.6	22	11.7
TOTAL	**3348**		**3160**		**188**	

Source: Prison Hospital Zagreb, University Hospital for Infectious Diseases Zagreb

In the prison population the total HBV infection in men (16.5%) and women (16%) is similar. The highest percentage is found in the IDU risk group (27.3% men, 25% women). For males, high positivity was found in psychiatric diseases (19%) and highly promiscuous (19%), while for women, the highest positivity was found in the IDU (25%) and alcoholic 27.3%) groups. The most prevalent combination of HBV markers was HBsAg negative, anti-HBc positive and anti HBs-positive (7.4% for men and women). Total HBV infection in male juveniles was 18.9% with highest percentages being found in males in the highly promiscuous (44.8%), alcoholic (25%) and IDU (23.1%) groups. In female juveniles HBV infection was registered in only 20% of the IDU group.

Total anti-HCV positivity was found in 14.4% of men and 10.6% of women prisoners. The highest percentage of HCV infection was registered in IDU group, 53% of male and 50% of female population. In juveniles, HCV infection was found only in the male population (4.3%) with 23.1% in the IDU group.

HIV testing revealed only 0.15% anti-HIV positives in the adult male population (5 cases) with 0.5% in the IDU group and 0.3% in the alcoholic group.

Testing of HBV markers in unvaccinated staff showed 11.8% positivity (13.4% men and 10.3% women. All samples were negative for HCV and HIV.

HBV and HCV co-infections were found in 6.1% of all adult prisoners, with more in the male (6.2%) than the female (4.3%) population. HBV/HCV co-infection was not registered in juveniles.

Table 6.5 – Structure of the juvenile prison population according to risk groups and gender

	Total		Male		Female	
	Number	%	Number	%	Number	%
IDU (Injecting Drug users)	18	12.5	13	10	5	35.7
Highly promiscuous	33	22.9	31	23.8	2	14.3
MSM (men having sex with men)	0	0	0	0	0	0
Alcoholics	19	13.2	16	12.3	3	21.4
Personality aberration	12	8.3	12	9.2	0	0
Psychiatric disorder	4	2.8	4	3.1	0	0
Non-IDU	1	0.7	1	0.8	0	0
At no risk	55	38.2	52	40	3	21.4
No response	2	1.4	1	0.8	1	7.1
TOTAL	**144**	**100**	**130**	**100**	**188**	**100**

Source: Prison Hospital Zagreb, University Hospital for Infectious Diseases Zagreb

Regarding the structure of the prison population, it should be noted that the most numerous (with the exception of no-risk group) are IDUs (24.3%), with higher prevalence in males (24.7%) than females (19.2%). This survey, which covered all 20 prisons in Croatia, showed that 25.7% of Croatian prisoners are infected with HBV, HCV or both viruses.

The percentage of HBV infection in the adult prison population in Croatia (16.3%) is in accordance with the majority of reports where the prevalence of serological markers for current or past HBV infection in prison inmates ranges from 13% to 47% and varies by region. This high percentage of HBV infection is primarily due to high HBV infection in IDUs (26.2%). The percentage of HBV infection greater than in general population, can be explained with different factors, most likely being prostitution, unprotected sex and higher injecting drug abuse. In juvenile population the percentage of HBV infection is higher than in adults (18.9%) primarily because of great positivity in the highly promiscuous (44.8%) and alcoholic (25%) group in males. All HBV positivity in juvenile females is concentrated in the IDU group (20%).

The total percentage of HCV infection in adult prisoners (12.5%) in comparison with general population (1.2%) is very high, as is the case with HBV infection primarily due to IDU group (53% men, 50% women). There is very limited data available on the prevalence and course of HCV in young offenders. In the juvenile population overall anti- HCV positivity is much lower than in adults (4.3% males) and it is concentrated in the IDU group (23.1%).

The study also noted a 0.16% of HIV positive inmates.

Based on these results, a program was introduced into prison system that includes systematical testing of all incoming prisoners, provision of precise information on HBV/HCV infection, administration of HBV vaccination and provision of therapy for infected inmates. The program runs continuously for almost a year and has given excellent results.

6.2 Other drug-related health correlates and consequences

Addiction as a chronic recurrent disease is often accompanied with other mental illness and disorder diagnoses. Most commonly, these are personality and behaviour disorders, affective and neurotic disorders, mental and disorders caused by alcohol and other chronic diseases connected with risk behaviour of addicts.

Data from 2009 shows that out of 7 733 treated persons, 48.3% had at least one accompanying diagnosis, which were mostly found in opiate addicts (51.1%).
Personality and behavioural disorders are the most common diagnoses, both with opiate (35.3%) and non-opiate (27.6%) addicts. Second most common diagnosis with opiate addicts are other, non-specified diseases (17.1%), and with non-opiate addicts those are mental disorders and alcohol caused behavioural disorders, as well as schizophrenia and schizotypal disorders (17.2%). Third most common disorders in both opiate (16.6%) and non-opiate (11.6%) addicts are affective disorders (depression, mood changes).

Table 6.6 - Persons treated for drug abuse in health care institutions, according to registered concurrent diseases and disorders (2009)

MKB-10		Opiate abuse		Non opiate abuse	
		Number	%	Number	%
F60- 69	Disorders of adults' behaviour and personality	1 127	35.3	148	27.6
F30-F39	Affective disorders (depression, mood disorders)	532	16.6	62	11.6
F40-F48	Neurotic, stress and somatoform disorders	380	11.9	59	11.0
F10	Psychological and behavioural disorders caused by alcohol	270	8.4	92	17.2
F20-F29	Schizophrenia, shizotypal and delusional disorders	239	7.5	92	17.2
F90-F98	Behavioural and emotional disorders appearing in childhood and adolescence	36	1.1	17	3.2
Z915	Registered suicide attempts	33	1.0	4	0.7
F00-F09	Organic and symptomatic psychological disorder	25	0.8	15	2.8
F70-F79	Mental retardation	6	0.2	2	0.4
	Other disorders	545	17.1	44	8.2
TOTAL		**3 196**	**100**	**536**	**100**

Source: Croatian National Institute of Public Health

According to 2009 data from Croatian Public Health Institute (individual notifications from maternity hospitals), out of total number of 43 870 births in Republic of Croatia, 26 women stated that they have used psychoactive drugs during pregnancy. Most of them were from the City of Zagreb (10 mothers), 4 mothers live in Zagreb and Osjek-Baranja County, 3 live in Istria County, and one in Krapina-Zagorje, Bjelovar-Bilogora, Primorje-Gorski Kotar, Brod-Posavina and Šibenik-Knin Counties. This number is lesser than in 2008 (33 cases), and is the lowest number for pregnant drug users since 2003.

6.3 Drug-related deaths and mortality of drug users

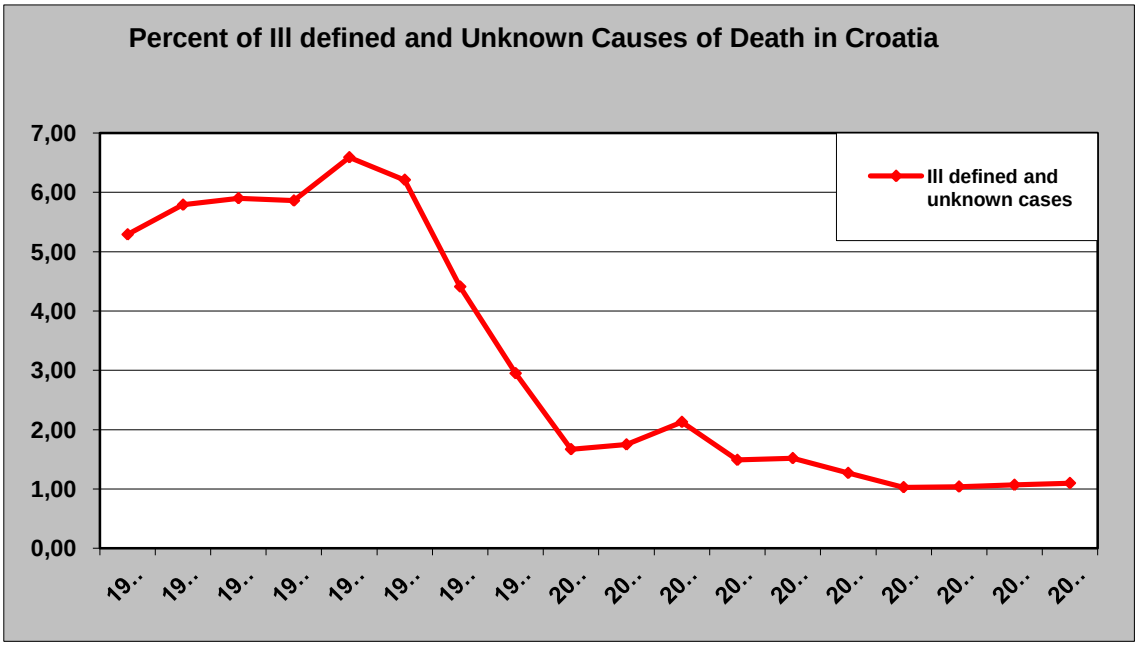
The central authority that carries out research on deaths in Croatia is the Croatian Statistics Bureau (CBS) which collects data on deceased persons in the entire country and is responsible for the comprehensiveness of data. Official statistics on deaths contains data on

causes of death for persons who, at the moment of death, had residence on the territory of the Republic of Croatia for twelve months or longer. Croatian National Institute of Public Health (CNIPH) is responsible for encoding underlying causes of death and the quality of mortality statistics data. Determining and encoding of the underlying causes of death is based on the information contained in the death certificate and it is carried out manually and centrally at the Department of medical demography and based on the definitions in Volume 2 of the International Classification of Diseases and Conditions – 10th revision (ICD-10), which has been implemented since 1995. Cumulative Official Updates to ICD-10 for encoding underlying causes of death have been implemented since 2005.

The mortality database, in addition to demographic data, also contains causes of death which are classified using a four-digit code, and this is connected to the CNIPH database. These two databases make General Mortality Register which is used to update all national registers maintained in the CNIPH.

Since 1997 CNIPH has been updating the data missing on death certificates (primarily due to the absence of external causes of violent deaths and autopsy and toxicological analysis results) through the network of County Departments of Public Health in order to improve the quality of mortality data. A continuous decline of the proportion of unknown causes of death from 6% to 1% (Figure 6.1) is noticeable. CNIPH together with County Departments of Public Health organise training courses for coroners on filling in death certificates.

Figure 6.1- Percent of Ill defined and Unknown Causes of Death in Croatia (1999-2009)

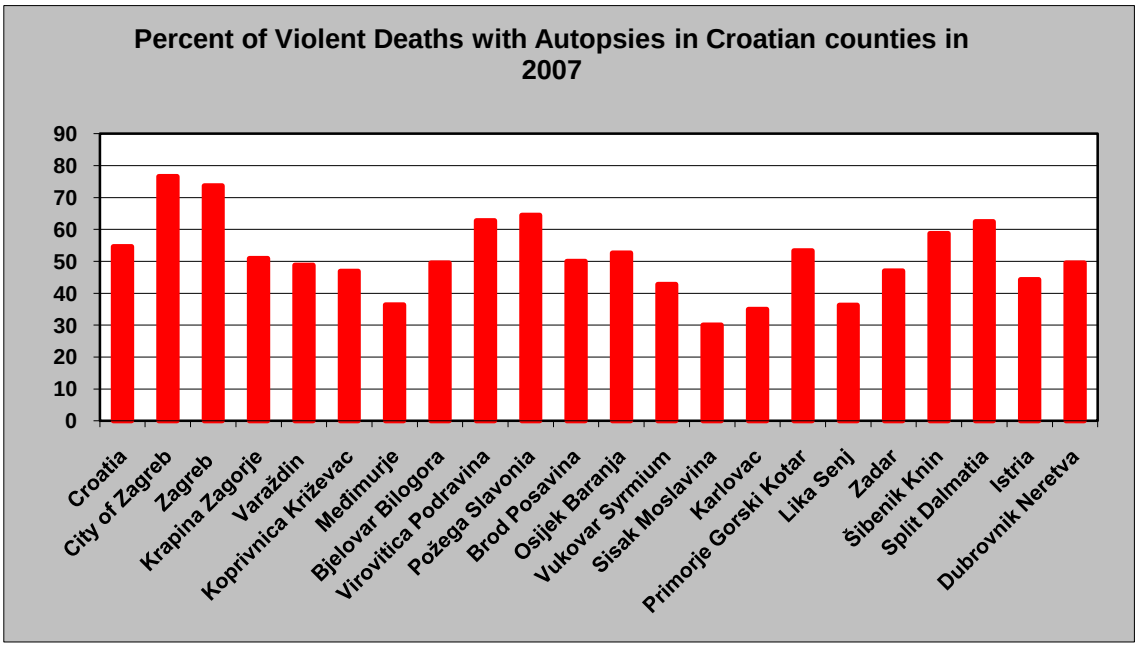


Source: Croatian National Institute of Public Health

In accordance with the law in Croatia, the cause of a violent death has to be confirmed by autopsy (toxicological analysis). Generally, this is applied for autopsies requested by an investigating judge when a criminal offence is suspected, and autopsies are financed from the justice sector. In some counties it is not possible to carry out the autopsy systematically in the case of a violent death which is not caused by a criminal offence if requested by a coroner and not by an investigating judge. The proportion of performed autopsies of violent deaths is between 30% and 80 % in different counties as shown in Figure 6.2, in some counties it is difficult or sometimes impossible to obtain the autopsy and toxicological analyses results requested by the investigating judge. The number of performed autopsies in

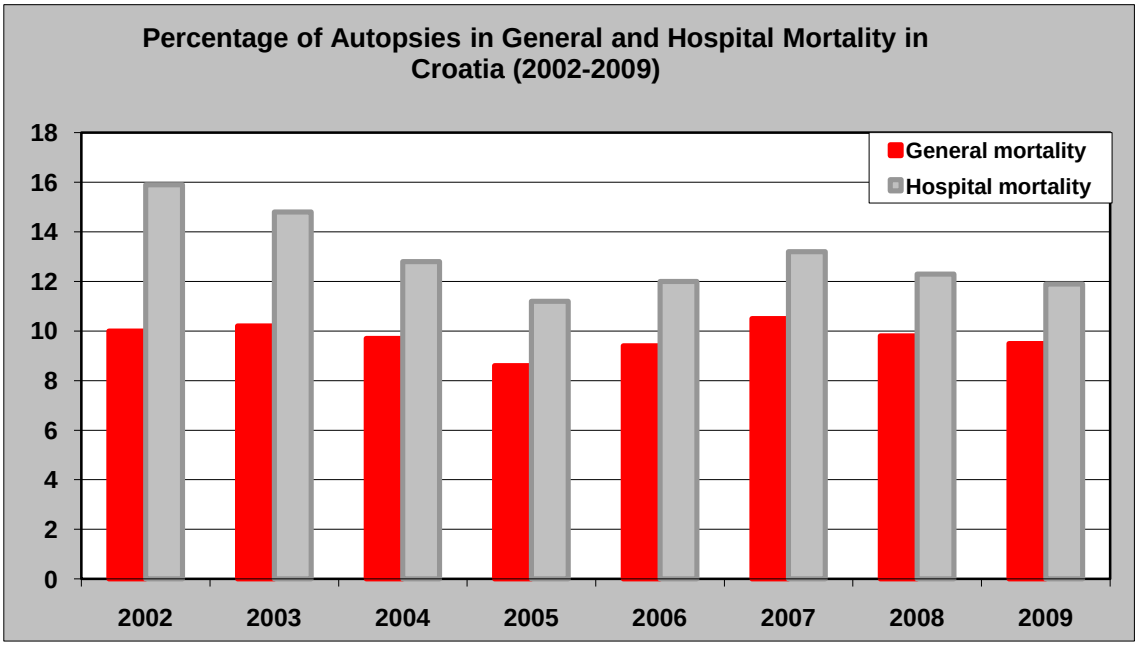
the last five years shows a falling trend in the hospital mortality while it remains stable in the general mortality and it amounts to around 10% (Figure 6.3).

Figure 6.2 - Percent of Violent Deaths with Autopsies in Croatian counties in 2007



Source: Croatian National Institute of Public Health

Figure 6.3- Percentage of Autopsies in General and Hospital Mortality in Croatia (2002-2009)



In the last four years two projects with the aim of improving the quality of mortality data have been implemented in Croatia. The Ministry of Health and Social Welfare's project "Quality Improvement of Mortality Statistics", which was implemented by the Croatian National Institute of Public Health, has been completed this year. The main objective was to make new regulations and the education of the coroners. Thus, in 2007 a proposition of the new Regulation on examination of the dead and determining the time and pattern of death was submitted to the Department for Legal Affairs with the Ministry of Health and Social Welfare, and in 2008 a proposition of the new Regulation on a death certificate form. The procedure

for accepting these regulations has not yet been completed. New DC is in accordance with WHO recommendations and new Eurostat Propositions. New Regulation on examination of the dead and determining the time and pattern of death has a very clearly defined system of collecting data on the cause of death, especially with regard to the obligation of performing autopsies and submitting toxicological analyses results.

The international project "Quality Improvement of Causes of Death Statistics" that was financed through European Union MB PHARE 2006 and implemented by CNIPH has also been completed. Within this project "Manual on filling in the death certificate" and a leaflet "Instructions on filling in the medical part of a death certificate" were published and given to all appointed coroners on the territory of the Republic of Croatia. Educational courses for coroners were held in Zagreb, Rijeka, Split and Osijek, during which participants talked about their experiences and problems with performing autopsies, especially in drug related violent deaths.

Key indicator: Drug related deaths (DRD) and mortality among drug addicts

With establishing the cooperation with EMCDDA the Republic of Croatia assumed the obligation to harmonise the national legislation on drug abuse and reporting systems for the five key indicators. Setting up the National Drugs Information Unit and assuming the obligation to gather, analyse and interpret data included forming a working group for the key epidemiological indicator "Drug related deaths and mortality among drug addicts". Members of the working group are representatives of institutions which participate in establishing causes of drug related deaths, and they are: CNIPH, Ministry of Interior (MOI), Institutes of Forensic Medicine of the faculty of medicine in Zagreb, Split, Rijeka and Osijek and CBS. In order to improve the quality of data on drug-related deaths, in 2007 the working group has written instructions on "Minimum requirements as recommendation for investigation of drug related deaths" and submitted it to the Ministry of Health and Social Welfare that has not yet recommended these guidelines for use. In 2008 the Cooperation Agreement was signed between CNIPH and MOI and it regulates information exchange in order to use the toxicological analyses results performed in the MOI toxicological laboratory to determine the cause of death.

Register of persons treated for drug abuse (TADR)

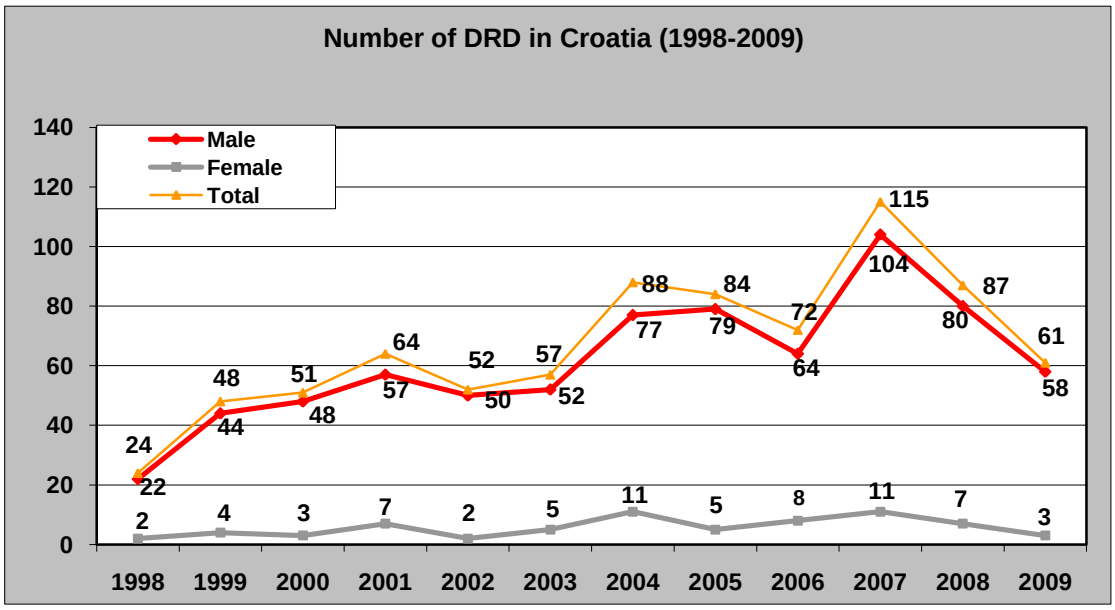
The register of persons treated for psychoactive drugs abuse was founded in 1978 at the Croatian National Institute of Public Health. The register includes all data on persons treated for psychoactive drug abuse or addiction in the health system. The data is collected from hospitals, specialist – consultation services, Service for addiction prevention and outpatient treatment (in-patient and out-patient). In 2008 the system for data collecting was extended to Therapeutic communities, and in future it is planned to include the data from the prison system. The modified Pompidou questionnaire and international classification of disease, tenth revision – codes F11-F19 are used to register the treatment.

Well developed cooperation between GMR and TDAR enabled the monitoring of causes of death among drug addicts who did not die of direct consequences of drug abuse (poisoning). Therefore DRD indicator in Croatia is being calculated from GMR data (drug-related deaths – DRD) and TDAR data (mortality among drug addicts). Standard tables ST5 and ST6 that are submitted to EMCDDA every year, contain data from GMR obtained through protocol "Selection B" (Drug Related Deaths (DRD), Standard protocol, version 3.2, 2009). It is important to emphasize that all amendments which change the cause of death and are obtained by 30 June of the previous year are entered in the GMR database.

Drug-related deaths (DRD) – GMR

During the implementation of the protocol "Selection B" we processed data on the number of drug-related deaths from 1998 to 2009. Analyses show the rising trend until 2007 when the highest number of deaths was recorded (115), and since 2008 the number of deaths has been falling. More than 90% of deceased are male so the total number of deaths corresponds to the number of deaths in male population (Figure 6.4)

Figure 6.4 - Number of DRD in Croatia (1998-2009)



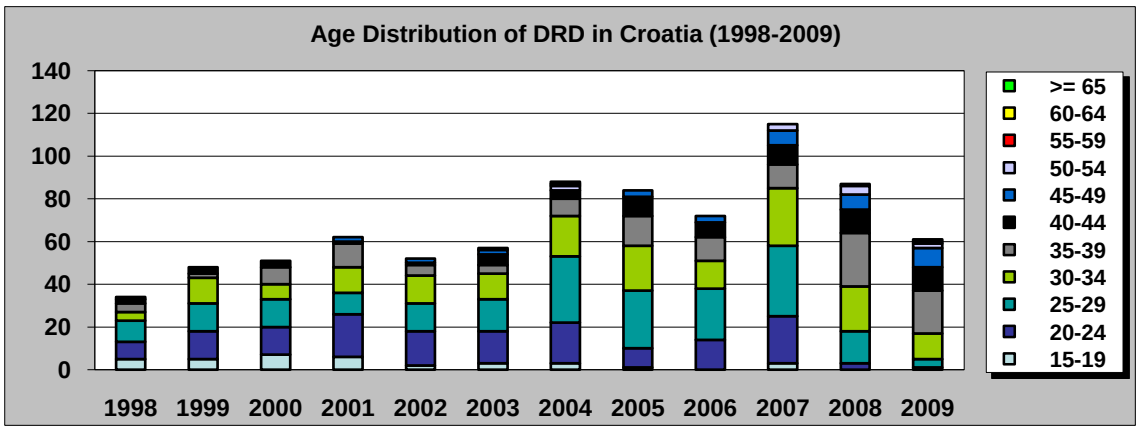
Source: Croatian National Institute of Public Health

In 2009, 61 persons died of direct consequences of drug abuse, which is 26 less than the previous year. Among them 58 (95%) were male and 3 (5%) female.

Age distribution of drug-related deaths

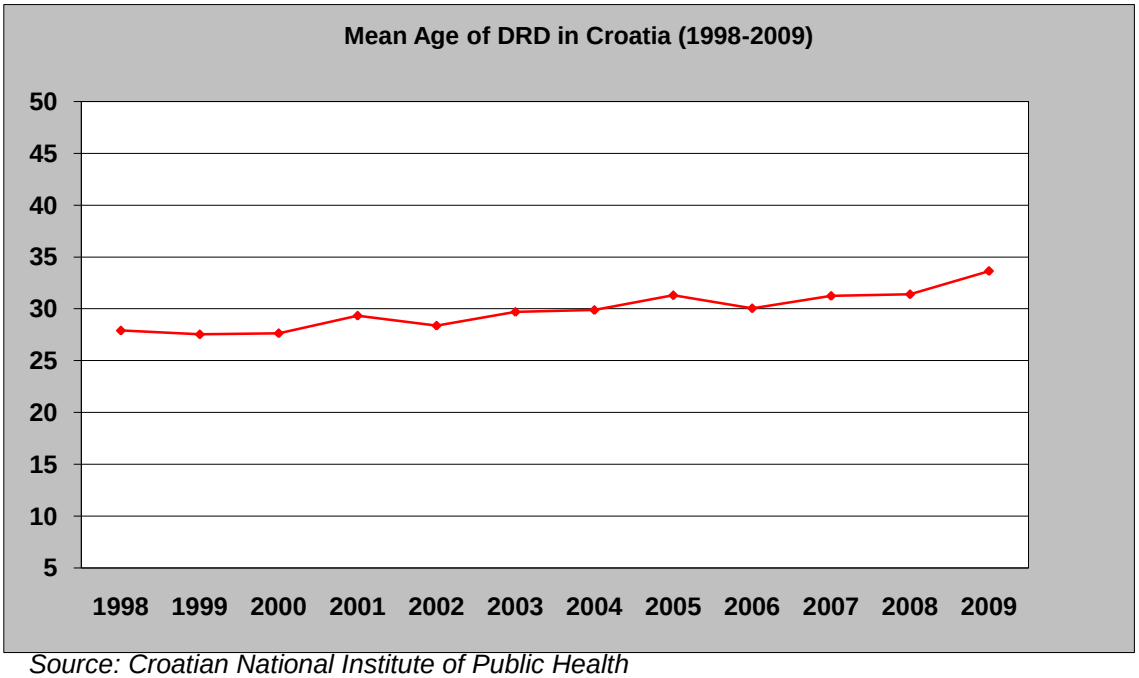
Figure 6.5 shows the age distribution of deceased persons with significant, continuous decrease in the number of deaths among younger age groups (15-19, 20-24, 25-29). In line with that, it is noted that the mean age of persons who died of drug-related deaths increased to 33.64 for men and 33.34 for women (Figure 6).

Figure 6.5 – Age Distribution of DRD in Croatia (1998-2009)



Source: Croatian National Institute of Public Health

Figure 6.6 – Mean Age of DRD in Croatia (1998-2009)

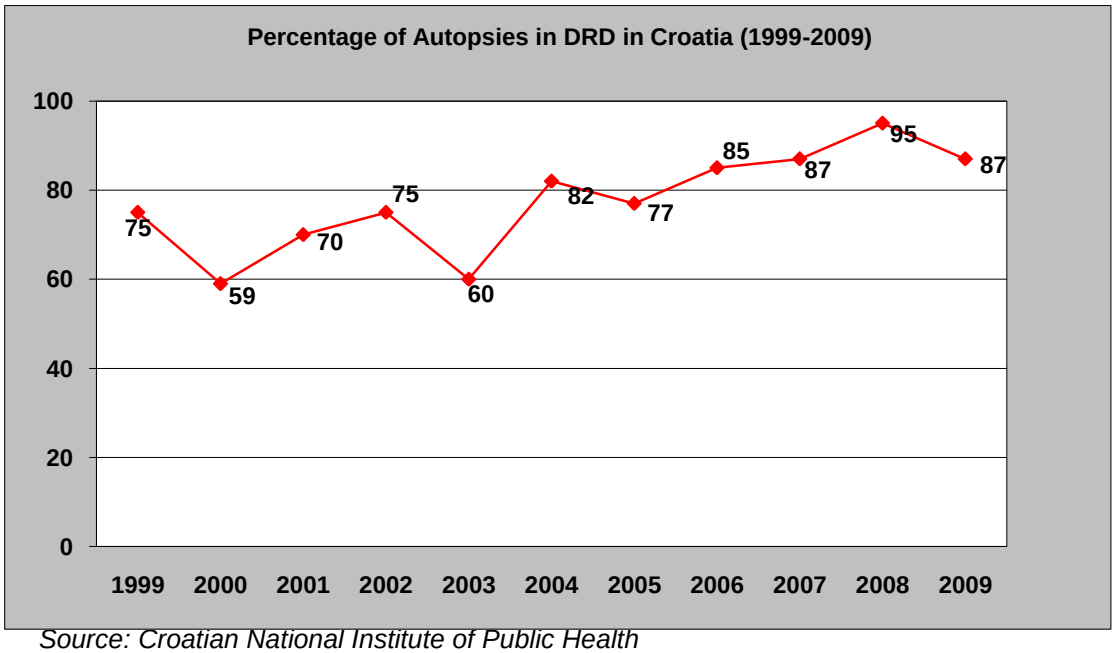


Source: Croatian National Institute of Public Health

Prevalence of the certain types of drugs in DRD

The analysis of toxicological analyses results shows that in Croatia deaths caused by opiates (heroin and methadone) prevail. In 2009 their proportion was 83%. Since 2008 deaths caused by cocaine intoxication have been recorded for the first time (four in 2008 and four in 2009).
Figure 6.7 shows the movement of the proportion of performed autopsies and toxicological analyses in DRD, with the upward trend with values from 60 % in 2003 to 87% in 2009. The highest proportion of performed autopsies (95%) was recorded in 2008.

Figure 6.7 – Percentage of Autopsies in DRD in Croatia (1999-2009)



Source: Croatian National Institute of Public Health

Setting up the working group for monitoring the indicator "Drug-related deaths and mortality among drug addicts" in Croatia resulted in improvement of the existing system for collecting data on causes of deaths (especially those caused by drug abuse). Establishing the quality communication among all participants of this process will ensure the implementation of standards and harmonisation of methodology related to calculating this indicator.

Mortality among addicts - TDAR

Mortality caused by psychoactive drugs abuse is related to deaths caused by acute intoxication with one or more drugs, and mortal cases caused by diseases developed due to drug abuse (e.g. cardiovascular problems with cocaine addicts), risk addictive behaviour (hepatitis) or accidents under the influence of psychoactive drugs. The criteria for defining drug-related deaths according the EMCDDA (European Monitoring Centre for Drugs and Drug Addiction) definition are related to narcotics overdose and intoxications where at least one substance is illegal drug.The system for collecting data and the cooperation between the Register of persons treated for drug abuse and GMR, also allows monitoring mortality of persons treated for psychoactive drug abuse.

Table 6.7 - Diagnoses of deaths (other causes of deaths) for deceased persons treated for psychoactive drug abuse in 2009

Cause of death	ICD-10	Number	%
Chronic viral hepatitis C	B18.2	2	6.9
Malignant neoplasms	C00-C97	4	13.8
Benign neoplasms	D10-D36	1	3.4
Diseases of the circulatory system	I00-I99	5	17.2
Diseases of the respiratory system	J00-J99	2	6.9
Diseases of liver	K70-K77	5	17,2
Diseases of the nervous system	G41.9	1	3.4
Accidents	V00-V99; W23; W69	6	20.7
Poisoning by antiepileptic, sedative-hypnotic and antiparkinsonism drugs	T42	3	10.3
Total	B18.2	29	6.9
TOTAL		**29**	**100**

Source: Croatian National Institute of Public Health

The data in Table 6.7 shows the number of deaths which are not defined as DRD. Out of total number of 90 deaths connected with psychoactive drug abuse, 61 are defined as DRD and 29 are deaths of persons treated for psychoactive drug abuse. The data displayed shows the diseases caused by long-term drug abuse and are the most common cause of death among the older addict population.

7 Responses to health correlates and consequences

Risk addiction behaviour includes all the behaviours connected with the base illness which can be exposed to concurrent illnesses and further complications. This especially refers to sharing of needles and syringes and other injecting equipment as well as risky (promiscuous, i.e. without using any protection) sexual behaviour. Hepatitis B, hepatitis C and HIV are only a few of the infectious diseases convenient for transmission via the aforementioned ways, and therefore the addict population is at higher risk of getting a disease than the general population. In accordance with the aforementioned, the activities aimed at reducing the spread of blood-borne diseases occupy a special position in combating drugs abuse.

7.1 Prevention of drug related emergencies and reduction of drug-related deaths

In Croatia, prevention of drug related emergencies and reduction of drug-related deaths is provided by non-governmental organisations and by the national network of Services for Mental Health and Addiction Prevention.

Available harm reduction programmes are, inter alia, focused on providing information on harmful effects of drug use to drug users such as risk of overdose, publishing educational and informational material, informing clients on dosages, safe injecting, different risks of drug use and the methods of providing first aid to a person in need.

Naloxon, an opiate-receptor antagonist also plays an important role in saving the lives of overdosed patients. It is available in Croatia as a clinical medicine in emergency wards and hospitals, as well as in pharmacy stores on prescription. In September 2009 pharmacotherapy with buprenorphin (Subutex) was replaced with buprenorphin - naloxon combination (Suboxon) for patients in substitution programmes carried out by the national health system, with the aim of reducing drug-induced deaths.

Within Croatian Early Warning System, Office for Combating Drugs Abuse (OCDA) with the purpose to prevent drug-related deaths, contacted non-governmental organizations in December 2009 to inform them about the “false cocaine” phenomenon which was found in some European countries. It was noticed that a few persons were overdosed after using cocaine but the analyses showed that the consumed substance was not cocaine but high purity heroin of untypical colour. OCDA forwarded information to NGOs with harm reduction programmes so they could inform their clients.

7.2 Prevention and treatment of drug-related infectious diseases

The prevention of infectious diseases is one of the key services provided by the low-threshold services. Preventing infections continues to play an important role in low-threshold centres and outreach work. The exchange of needles and syringes is especially important. In Croatia it is also possible to buy syringes and needles in pharmacies but there are no information on paraphernalia which is sold to drug addicts and paraphernalia which is sold to other patients (e.g. patients with diabetes).

Harm reduction programmes are an integral part of activities relating to public health which were adopted by the Croatian Parliament in 1996, and which are recognized and encouraged by the Ministry of Health and Social Welfare. The main goal of *Harm reduction* activities is to reduce the risk of spreading the blood-borne diseases HIV/AIDS, hepatitis B and hepatitis C.

Harm reduction programmes mostly include the distribution and collection of needles and syringes; distribution of condoms, distilled water ampoules and tampons soaked in alcohol; dissemination of educational materials, testing for hepatitis B, hepatitis C and HIV, referrals for testing, etc.

As in previous years, in 2009 there were four non-governmental organizations[26] and one institution[27] active on a regular basis at different locations countrywide where harm reduction programmes were conducted. The "LET" Life Quality Improvement Organisation started and implemented the initiative to create a network of organisations that conduct harm reduction programmes, and in 2009 "BENEFIT" organisation network was founded.

ST10 pilot, section B, 2010 shows information on geographical spread of NSP sites in the country. The "HELP" association has one drop-in centre in Split and outreach workers that provide needle and syringe exchange programmes in the cities along the coastline, which include Split, Dubrovnik, Makarska, Šibenik, the islands of Korčula, Brač, Šolta and Hvar, as well as in Osijek, Vukovar, Đakovo and Vinkovci which are the inland cities in the Eastern Croatia. The "LET" association is active in the Zagreb area at 12 locations where outreach workers provide needle and syringe exchange programmes. In the city of Rijeka the Terra association has one drop-in centre and covers 10 sites with outreach activities. In addition to harm reduction programmes, they also provide counselling for drug users. Needle and syringe exchange programmes are also available in Rijeka, Lovran, Labin, Opatija, Delnice and the islands of Cres, Krk, Mali and Veliki Lošinj. During 2009 this NGO expanded their work to two more sites: Karlovac and Ogulin. The "Institut" association has one drop-in centre and 8 locations for outreach work in Pula, 2 locations in Poreč and 10 other locations in Istria country (Brtonigla, Rovinj, Labin, Pazin, Vrsar, Raša, Umag, Buje, Rovinjsko selo and Fažana). Harm reduction programmes are carried out by the Croatian Red Cross in Zagreb, Zadar, Nova Gradiška and Krapina, where drop-in centres can be found.

Table 7.1 shows the number of the distributed equipment and educational materials in the aforementioned organisations in 2009. The equipment that was distributed the most consisted of needles (636 303 pieces), followed by syringes (289 759), condoms (43 587) and educational and informational material (21 575). Compared to the data on distributed material in 2008 (see 2009 National Report), it is evident that in 2009 a larger amount of equipment (except needles) was distributed.

Table 7.1 - Number of distributed equipment and educational materials in 2009, by Croatian Red Cross and NGOs

Croatian Red Cross and NGOs	Distributed equipment and educational materials			
	Condoms	Needles	Syringes	Educational material
Croatian Red Cross	4 306	26 527	3 934	570
Institut	4 330	27 120	21 730	2 655
Terra	8 501	103 983	100 035	2 050
LET	6 450	78 673	73 060	1 300
HELP	20 000	400 000	91 000	15 000
TOTAL	43 587	636 303	289 759	21 575

Source: Office for Combating Drugs Abuse

[26]Terra, LET, HELP, Institut
[27]Croatian Red Cross

Table 7.2 shows the number of collected equipment in 2009. A total of 241 136 needles and syringes were collected. In reporting on the amount of the collected material, the Institut organisation presented the values in kilograms (136.6 kg). According to the estimate of the association, 1 kg of collected infectious waste contains about 300 needles and syringes, both of them represented in the same proportion.

Table 7.2 - Number of collected equipment in 2009, by Croatian Red Cross and NGOs

Croatian Red Cross and NGOs	Collected equipment	
	Needles	Syringes
Croatian Red Cross	15 612	15 612
Institut	20 490	20 490
Terra	10 145	10 127
LET	15 285	13 375
HELP	95 000	25 000
TOTAL	156 532	84 604

Source: Office for Combating Drugs Abuse

Table 7.3 shows the total number of users, as well as the number of old and new users of harm reduction programmes. In 2009, 4 877 people used the services of the Croatian Red Cross and various NGOs in Croatia (see also ST 10, 2010). Out of the total number of participants, 390 (8.0%) people started participating in the program in 2009, while 4 497 (92.0%) people were users who had been involved in harm reduction activities in previous years as well.

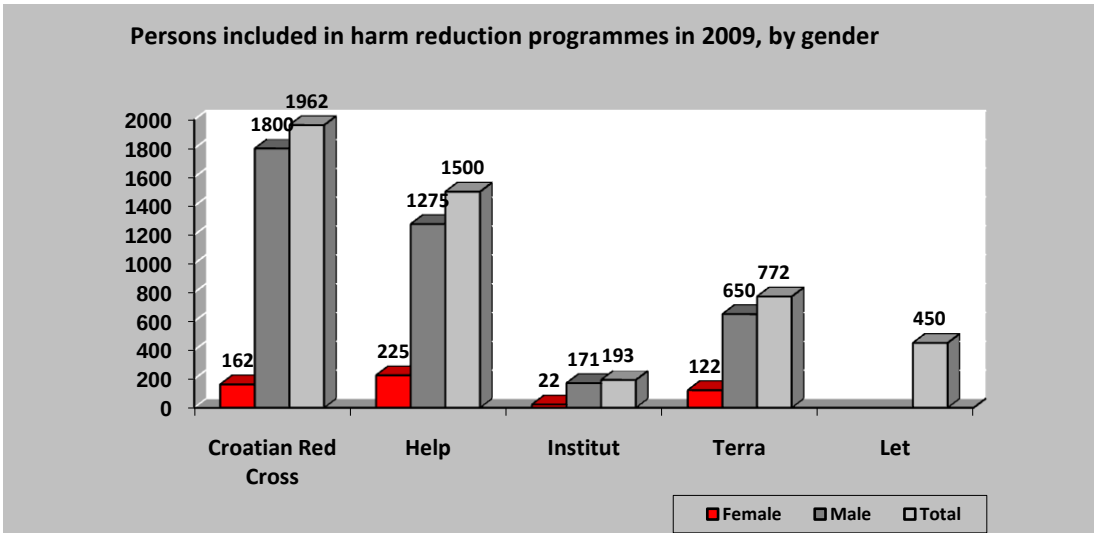
Table 7.3 - Persons included in harm reduction programmes in 2009 in Croatian Red Cross and NGOs

Croatian Red Cross and NGOs	Persons included in harm reduction programmes		Previously registered		Newcomers	
	Total	%	Total	%	Total	%
Croatian Red Cross	1 962	100	1 830	93.3	132	6.7
Institut	193	100	169	87.6	24	12.4
Terra	772	100	679	88.0	93	12.0
LET	450	100	402	89.3	48	10.7
HELP	1 500	100	1 407	93.8	93	6.2
TOTAL	4 877	100	4 487	92.0	390	8.0

Source: Office for Combating Drugs Abuse

The biggest number of persons was included in Croatian Red Cross and NGO Help. Out of the total number of 1 962 persons in the Croatian Red Cross's programme, 91.7% (1 800) of them were male, while 8.3% (162) were female. 85% (1 275) males and 15% (225) females used the services of the "HELP" association. In the Institut there were 88.6% (171) males and 11.4% (22) females and in the Terra there were 84.2% (650) males and 15.8% (122) females (Figure 7.1). Gender structure is not available for the Let association. NGOs and Croatian Red Cross workers stress that the actual numbers of female users of harm reduction programmes are somewhat higher than those shown (due to indirect users), since it was noticed that males often took clean equipment for their female partners.

Figure 7.1 – Persons included in harm reduction programmes in 2009 in Croatian Red Cross and NGOs, by gender



Source: Office for Combating Drugs Abuse

In November 2010 started a two-month drug market research among the users of harm-reduction programmes, conducted by the Faculty of Education and Rehabilitation Sciences of the University of Zagreb, with the support of the OCDA. Apart from the information about retail prices of drugs and the estimate of problem drug use, the research will provide the insight into socio-economic characteristics of the persons included in the harm-reduction programmes. More detailed presentation of the research will be presented in the next National report.

Croatian representative from Let organisation attended the 5th IAS Conference on HIV Pathogenesis, Treatment and Prevention which was held in July 2009 in Cape Town, South Africa. The event was organized by the International AIDS Society (IAS), in partnership with South African-based NGO, Dira Sengwe, organiser of the series of South African AIDS Conferences. Held every two years, the conference attracts more than 5 000 delegates from all over the world. It is a unique opportunity for the world's leading scientists, clinicians, public health experts and community leaders to examine the latest developments in HIV-related research, and to explore how scientific advances can – in very practical ways – inform the global response to HIV/AIDS.

With the support of the Ministry of Health and Social Welfare, Croatian Institute of Public Health issued its third amended edition of the Handbook for HIV Testing and Counselling. The Handbook was created within the programme W*ork of the voluntary, anonymous and free-of-charge HIV counselling and testing centres* conducted by the Croatian Institute for Public Health, county Institutes for public health, Prison hospital in Zagreb, as well as the Clinic for Infectious diseases "Dr. Fran Mihaljević". The Handbook is intended for the members of the centre teams with the purpose of obtaining information that will help them in their work in order to offer high-quality service to their users (Nemeth Blažić 2009). The handbook contains basic information on HIV/AIDS, HIV counselling and testing, basic counselling skills, organisation and management of the voluntary HIV counselling and testing in Croatia, emphasises the importance of supervision and support to counsellors, gives the review of procedures in case of professional exposure to HIV, HCV and HBV viruses, emphasises the role of monitoring and evaluation and provides the review of legal regulations and ethical aspects of the work in the voluntary HIV counselling and testing centre.

The Centre for anonymous and free-of-charge HIV testing is the place where through

individual approach information and advice on HIV/AIDS can be provided, as well as anonymous and voluntary HIV testing of those who want to know what their HIV-status is, and giving help with referring to medical, psychological and social help. In Croatia there are currently 13 centres, and additional information on their organisation, financing and locations can be found in the 2009 National Report (Chapter 7.2).

Treatment of the persons included in the treatment in the Services for Mental Health and Addiction Prevention includes regular urine tests (quick tests) on the presence of drugs and their metabolites, as well as capillary blood on HIV, HCV, HBV and syphilis if the patient behaved in a risky manner (common use of addiction equipment and unprotected sexual intercourses). During 2009, 27 331 urine tests were conducted, which amounted to the average of 2 278 tests per month. Most tests were conducted in the City of Zagreb (7 398), followed by Split-Dalmatia County (5 485), Zadar County (3 082) and Istria County (2 246). Capillary blood tests are less represented. So, in 2009 the total number of 1 292 blood tests were made, which amounted to 108 tests per month. Most tests were conducted in Primorje - Gorski Kotar County (276), followed by Split-Dalmatia county (265) and Dubrovnik - Neretva County (258) and the City of Zagreb (251) (Katalinić, 2010).

Research Triangle Institute (RTI) International from USA conducted a survey in 2009 on Dead-Space Syringes and HIV Risk among Injecting Drug Users[28]. OCDA and Croatian Red Cross participated in the survey by filling in the Dead-Space Syringe Project Questionnaire. According to the aforementioned study, syringe type affects HIV transmission among intravenous drug users. Researchers explain that when a plunger on a syringe is fully depressed, all syringes retain fluid in what has been termed “dead space”. In high dead-space syringes, which usually have detachable needles, more than 1000 times more blood is retained in the syringe after washing than in low dead-space syringes. The researchers found that even a small percentage of exposures involving high dead-space syringes can increase the spread of HIV dramatically. Therefore, syringe exchange programs may consider providing low dead-space syringes to drug users as a potential harm-reduction measure.

7.3 Responses to health correlates among drug users

Psychiatric comorbidity is common within the addiction population whether it is caused by psychoactive substances or is present independent of psychoactive substance use. Not treated mental disorders complicate the course of addiction treatment and increase relapse rate, no matter if a patient is included in the treatment programme or not. Therefore, if a person suffers from some other psychiatric illness apart from addiction, an attempt is made to treat both simultaneously. When this is feasible, the aim is to either achieve abstinence from drugs, to reduce harm using some means that do not exacerbate psychical disturbances. Addicts undergoing a maintenance treatment continue with the treatment on the very day of admission in any hospital ward, in accordance with the instructions of a competent addiction prevention centre.

[28] More information can be found on http://www.rti.org/page.cfm?objectid=F052D79A-F352-D594-F6746DF01805508F

8 Social correlates and social integration

In Croatia, the public is extremely sensitised to the problem of drug abuse. Numerous institutions have programmes for helping drug users, which is frequently above the level that exists in many developed western countries. The problem of drug abuse is elevated to the level of a political and social problem. Similar to other southern countries, family still plays important role in the Croatian society and acts as protective factor for potential social exclusion. Analogously, drug addicts are often protected by the family and enjoy full support in the rehabilitation and social reintegration process. However, more efforts should be invested in strengthening educational role of the family, increasing communicational skills and raising awareness about drug related risks and harms since average time between first use of drugs and the first referral to treatment is 10 years, indicating that family (and society) hasn't recognised problem on time.

In order to integrate back into society as many (former) drug users as possible as productive and stabile members that have good quality of life, the Croatian Government continues to strongly support and enhance national Project of Social Reintegration of Drugs Addicts, which in 2009 saw significant improvement in the terms of number of addicts that used some of the possibilities offered by the Project, whether that was continued education or employment.

8.1 Social exclusion and drug use[29]

If for the introduction we take a short glance at the Croatian economy in 2009, which is predominantly service-based, gross domestic product (GDP) dropped an annual 5.8%. With 64 % of the average EU GDP per capita in 2009, Croatia was slightly better standing than Hungary, Estonia and Poland. Data of the Croatian Bureau of Statistics also show that a rather elevated unemployment of 9.1% together with the increased youth unemployment rate of 25.1%, as well as slow progress of economic reforms still remain persistent economic problems. All these factors contributed to a slight increase of at-risk-of-poverty rate to 18% (2008: 17.4%). According to the calculation of the Independent Trade Unions of Croatia for a four or three-member family per month, the average net salary covers only about 80% of the consumer basket costs (food, toiletries, clothes, housing, transport and culture). For subtenant the average salary covers about 62.7% of everyday costs (Independent Trade Unions of Croatia, Consumer basket sum of 12 month, Reports from 2009). Not so bright economic situation could potentially lead to higher social exclusion in Croatia.

Concept of social exclusion appeared in the Croatian professional publications in mid nineties of the last century and since then it is slowly entering into the scientific and political discourse. Like most new Member States, Croatia has faced serious challenges in social exclusion while transforming its society and restructuring its economy. However, the intensity of Croatia's struggle with poverty and social exclusion is no greater than that found in other EU Member States. Multifaceted causes for poverty and social exclusion as found in Croatia are long-term dependence on low or inadequate income, long-term unemployment, low paying and/or low quality employment, low levels of education and training, children being raised in vulnerable families, the impact of physical and mental disabilities, rural-urban disparities, racism and discrimination, and, to a lesser extent, homelessness and migration.

[29] Please take a note that all data on socio-demographic characteristics (living status, education, employment) of drug users in this subchapter are obtained from the Registry of Persons Treated for Psychoactive Drugs Abuse in the Republic of Croatia (Croatian Institute of Public Health), correspond to the data in TDI 1 and TDI 2, 2010 and are in a different context described in Chapter 5.3.

However, it seems that bound between unemployment and social exclusion is significantly weaker in Croatia than in other countries in transition.

In Croatia there are two main reasons for exclusion of youth: drop out of the educational system and unstable position on the labour market. However, unemployment is not necessarily related to poverty or social exclusion of young people in Croatia due to the fact that many unemployed young people live with parents or other family members, who bear or share their essential living expenses.

At the national level, School Prevention Programmes – SPP (still valid in 2009, although they are going to be replaced with the National Addiction Prevention Programme for Children and Youth in Educational Settings and in Social Welfare System for the period 2010-2014; see Chapter 3) make efforts to reduce the interest of school-aged children in experimenting with both illegal and legal drugs (such as alcohol and tobacco). The programmes also try to reduce the exclusion of young people who have problems with drug and alcohol consumption through discreet protection programmes. However, the SPP does not manage to help young people with high-risk behaviour (behavioural disorders, abuse of drugs and alcohol, inclination to delinquency), so they frequently leave schools. Social care institutions have not been successful in providing efficient assistance in preventing their further social marginalization. Most of treated drug users have secondary school education (65.8%), but there is a significant number of those who have never finished their secondary school education or who have finished only primary school (23.7%). Only 5.6% of the total number of treated drug users have colleague or university qualifications.

Unemployment as a significant social problem also affects persons treated for drug abuse. More than half of treated persons were unemployed, 33% had regular job and 7% were still attending school or university. If we look specifically at the drug addicts treated for opiates, it is interesting that 38.1% of them had regular employment, 13.9% worked occasionally, additional 4.8% received pension and 2% were self-employed, which makes 52.8% of treated opiate addicts with some kind of income (in 2008: 62.4%). Since non-opiate users are significantly younger population, only 34.1% of them had regular or occasional job but 26% (in 2008: 32.6%) were still in school compared to 2.5% of opiate addicts. However, if compared to the situation in 2008, both employment and education rates among drug addicts were decreased in 2009. To a lesser extent this is conditioned by the generally high rate of unemployment amongst young people and worsening economic situation in the country, and to s greater extent by the almost impossible task of conciliating the chaotic, dependent lifestyle of drug users with the responsibilities of employment.

In order to improve those figures and to reintegrate in the society larger part of treated drug addicts, state and local governments increased measure for further education and employment of drug addicts in the scope of the Project of Social Reintegration of Drugs Addicts, which is detailed in Chapter 8.2.

According to the UNDP's Human Development Report for Croatia, Unplugged: Faces of Social Exclusion[30], one of the most threatened social groups are homeless. Despite the fact that homelessness is relatively new phenomenon in Croatia, number of homeless people is slowly growing which can be related to socio-economic changes in Croatia. Survey[31] conducted in the City of Zagreb in 2002 registered around 400 homeless in our capital, and according to some estimates in whole Croatia there are more than 1 000 homeless (Census

[30] Bayley D., Cameron Bray T.S., Gorančić-Lazetić H. editors (2006). Human Development Report for Croatia, Unplugged: Faces of Social Exclusion. United Nations Development Programme (UNDP) in Croatia, Zagreb.
[31] Šostar Z., Bakula-Anđelić M. (2002). Homeless in the City of Zagreb. The City of Zagreb, City Department for Health, Social Welfare and Veterans, Zagreb.

2001: population of Zagreb was 779 145; population of Croatia was 4 437 460) [32]. However, one should be very careful with those figures State and local governments are undertaking numerous measures to prevent further expansion of homelessness and to provide basic requirements for their integration in the society. Major cities in Croatia have shelters for homeless that besides accommodation provide food, clean clothing and personal hygiene and Zagreb survey showed that most respondents use one of the forms of social welfare assistance. One of the most active nongovernmental organizations in this area is association "Most" that manages two shelters for homeless in Split (second largest city in Croatia) but also works with risk population of youngsters that have already started to experiment with drugs. Unfortunately, there are no data available from shelters.

Picture 8.1 – Magazine on homelessness "Street Lamps"[33]

Source: Shelter "Roses of Saint Francis", Rijeka

Data on living status of treated persons (7 733 in total) available in the Registry of Persons Treated for Psychoactive Drugs Abuse in the Republic of Croatia indicate that there are not many cases of registered homeless drug users. But those who are in need can refer to one of the homeless shelters or therapeutic communities, where they are accepted if they are currently avoiding drug use. Most treated persons (58.3% or 4 514) live with their parents, 9.1% (707) lives with their partner, while 11.4% (886) treated persons live with a partner and a child. These statistics show that addicts are mostly not isolated from society and that their primary or secondary family does not abandon them during the treatment. Data showing higher number of treated persons who live with their primary family, though they should have already begun their independent life, does not differ from the general population data on the way of living at age between 25 and 35 years old. According to the available data, only 11.1% (857) addicts stated that they live alone.

Although there were no specific scientific studies about correlation between taking drugs and prostitution, homelessness and other socially excluded groups, in 2010 the Office for Combating Drug Abuse (OCDA) compiled a questionnaire for non profit organizations that deal with issues regarding drug addiction and social programmes pertaining to problems connected to drug abuse. The form consists of several parts: organizations general

[32] Croatian Bureau of Statistics (2001). Census of Population, Households and Dwellings. Croatian Bureau of Statistics, Zagreb.

[33] Aim of the magazine "Street Lamps" is to bring closer everyday life of homeless people to the general public, to raise the awareness about the related problems and it can be sold exclusively by homeless people. It is part of an Internet based international network of street newspapers (www.street-papers.org).

information, area of activity (prevention, treatment/rehabilitation, harm reduction programmes, problem drug use, etc.), and information about basic problems and recommendations for future progress in working with programme users. A special part of the form addresses the issue of homeless addicts and addicts that practiced prostitution.

Based on the information provided by three nongovernmental organizations, in 2009 there were 7 persons that practiced prostitution, and one homeless person which was included in organizations programmes. “NADA” nongovernmental organization for combating drug abuse and assisting families of addicts from Zadar County reported two cases of prostitution. Both were women who practiced prostitution in order to finance their heroin addiction. Nongovernmental organization for improving quality of life “LET” from Zagreb reported five cases of prostitution. All five were single mothers from City of Zagreb area, who practiced prostitution due to lack of financial funds. Nongovernmental organization “PET+” from Zagreb reported one case of a homeless addict, a person from dysfunctional and broken family, who used services their NGO.

The figures on living status, education and employment among persons who are in the system of treatment indicates that in average there are more people fortified with protective factors in their lives during the treatment. Poverty and lack of material resources which is always connected with problematic drug use significantly influences different life aspects and can lead to social exclusion, but once people decide to change their path, the social care system in Croatia is capable to respond to their needs.

8.2 Social reintegration

The Project of Social Reintegration of Drugs Addicts (in the further text: the Project) which completed one of the rehabilitation programmes inside therapeutic communities or penal institutions, and addicts which have been successfully abstaining from drugs for a longer period of time and are complying with the prescribed therapy to facilitate a recovering addict’s reintegration in communities, was adopted by the Croatian Government in 2007 and continued to conduct actions that helped to improve overall process of social reintegration in Croatia in 2009. The Project is extremely important in comprehensive treatment of addicts, and is also a prerequisite for successful maintenance of abstinence, discrimination prevention and inclusion into society. Therefore, this project holds an important place in the National Strategy on Combating Drug Abuse 2006-2012 and the Action Plan on Combating Drug Abuse 2009-2012, and is one of the top priorities for the next period of time, because education, employment and social reintegration of treated addicts make a key issue in comprehensive treatment and later abstinence period.

The procedures of including the addicts into education and employment programmes are described in the Activities and Cooperation Protocol for competent state bodies, institutions and civil society organizations in the implementation of the Project of Social Reintegration of Drugs Addicts. The main goal of the Protocol is to precisely define the competencies and responsibilities of the stakeholders in the implementation of the project measures and activities both, at the national and local level, as well as the forms, ways and contents of cooperation between them, and in such a way assure efficient implementation of project activities.

Based on the reports of the competent ministries and other competent bodies, the OCDA has compiled the comprehensive Report on the Implementation of the Project of Social Reintegration of Drugs Addicts for 2009, which was adopted by the Committee on Combating Drugs Abuse. Similar like previous years, the OCDA in cooperation with the Croatian Employment Service, updated the job list for counties in the Republic of Croatia, for which the Ministry of Science, Education and Sport made an offer for occupational retraining and

further education programme, which included the list of educational institutions that will implement the programme in the particular counties for the listed jobs. The aforementioned was delivered to all therapeutic communities, the Ministry of Justice – Imprisonment System Administration and published on the OCDA's web page.

Measures and activities in the field of encouraging education of treated drug addicts in 2010 will be included in the new plan document based on the priorities established by the Joint Memorandum on Employment Policy Priorities of the Republic of Croatia, which was adopted by Croatian Government in April 2008. The National Implementation Plan on Employment 2010 – 2011 will start a new cycle of active employment measures.

With the aim to promote employment of successfully treated addicts, in May 2009, the Croatian Government adopted National Plan for Employment Incitement 2009-2010, while in April 2009 it adopted Programme for Incitement of Small and Midsize Entrepreneurship 2008-2012. Since it was noted that a large number of addicts wishes to complete high school education after completed treatment in therapeutic community or after completed prison sentence, the Committee for Combating Drug Abuse adopted in March 2009 an annex on the Project that enables the users to start high school education at the expense of the Ministry of Science, Education and Sport, after they complete therapy or prison sentence.

During 2009, all the authoritative ministries and other state bodies conducted project activities in compliance with responsibilities and competences defined in the Project. According to these institutions, in 2009 a considerably larger number of users applied to the Project than in the previous year, with especially high interest in re-educational and re-vocational programmes, and completion of started high school education based on the annex of the Project.

In order to sensitize general public to the Project implementation, the OCDA organized presentation for the public media, as well as education for coordinators of the Project implementation for Split Dalmatia County, Šibenik Knin County, Dubrovnik Neretva County and Zadar County. The event took place in Split in November 2009. The aim of the education was to foster partnership between institutions responsible for programme implementation at national and local level, to contribute to more efficient project activities implementation and to ensure better social reintegration of treated addicts.

As already described in the last year's Report, there is a Project database managed by the OCNDA, so-called "UZDA", which consists of the Collection of personal data on the beneficiaries of the Project for the purpose of monitoring and evaluation of the individual reintegration programmes. In 2009, total of 30 forms for individual programme monitoring were entered in the Collection of personal data of persons included in the Project. Most of the forms, 14 of them, were received from Social Welfare Centres, 6 forms from Regional Services of the Croatian Employment Service, 8 came from therapeutic communities, social care institutions and prisons and 2 from Services for Mental Health and addiction Prevention. The forms pertain to 16 persons, 3 of which were included in the Project already in 2008. According to processed data, 13 persons entered the Project in 2009, 7 males and 6 females. Professional guidance was provided for 13 persons, and 9 persons were included in educational programmes. Out of 13 persons included, three persons managed to find employment, based on Annual Plan for Employment Incitement, without using re-vocational or re-education services from educational institutions.

The OCDA advanced the initiative to adopt a amendments to the Project which would enable addicts who finished one of treatment programmes in therapeutic community or a prison sentence to complete high school education, financed by the Ministry of Science, Education and Sports. The recommendation for involving addicts in the Project is given by the Social Welfare Centres, which are also responsible for monitoring progress of education and are

obliged to report to the Services for Mental Health and Addiction Prevention on client's abstinence and inclusion in psychosocial treatment programme. Nongovernmental organizations that promote programmes for re-education and re-vocation training for addicts and temporary or permanent employment, as well as other forms of social reintegration of treated addicts (welfare rights counselling, inclusion in culture or sport activities, employment or housing aid, etc.) were co financed by the OCDA.

Department of Medical Affairs in the Ministry of Health and Social Welfare provided financial means for medical examinations of prisoners included in the Project and also the choice and contracting of specialist medical examinations by work medicine experts, in the counties where penal institutions are located. According to received reports and invoices for specialist medical examinations, estimates of health and work ability were conducted for eight persons. In 2009, professionals in the Social Welfare Centres interacted with 17 drug addicts which completed one of the available rehabilitation programmes in therapeutic community or prison, or are involved in the outpatient treatment and stably maintain abstinence for a longer period of time.

In 2009, Regional Offices of the Croatian Employment Service continually implemented measures for promotion of education and employment of treated drug addicts (SQ 28), in accordance with the National Strategy on Combating Drug Abuse and Action Plan on Combating Drug Abuse 2009-2012. Measures were accomplished through professional guidance and active co-financing and financing of education and employment measures from the National Plan for Employment Incitement 2009-2010. Throughout 2009, the Croatian Employment Service conducted identification of registered treated drug addicts in order to include them in activities provided in the Project. In the context of preparation for employment, 92 former addicts were included in activities of professional guidance, and for 79 addicts an assessment of work ability was conducted. In addition, during 2009 there were provided 155 individual counselling services for the Project clients and 43 users were included in workshops on skills of active job search. The Croatian Employment Service implements measures of active employment by co-financing of employment of special unemployed groups, including former drug addicts. Besides these measures, the Croatian Employment Service promotes employment through education programmes financing, as well as inclusion in public works. In total, these measures helped to employ 14 treated drug addicts (Table 8.1).

Table 8.1 – Number of unemployed persons - treated drug addicts included in activities of professional guidance and work ability estimates of the Croatian Employment Service, in educational programmes and employed through the Service in 2009

Regional Service	Number of treated addicts included in proffesional guidance activities	Number of treated addicts sent to work ability assessment	Number of treated addicts included in educational programmes	Number of employed addicts
Bjelovar	0	0	0	0
Čakovec	4	1	0	1
Dubrovnik	5	5	0	4
Gospić	0	0	0	0
Karlovac	0	0	0	0
Krapina	0	0	0	0
Križevci	0	0	0	0
Kutina	0	0	0	0
Osijek	27	27	27	0
Požega	1	1	1	0
Pula	3	0	0	1
Rijeka	4	4	0	0

Sisak	0	0	0	0
Sl.brod	0	3	1	0
Split	27	27	12	5
Šibenik	2	1	0	0
Varaždin	0	1	0	0
Vinkovci	0	0	0	0
Virovitica	2	2	1	0
Vukovar	0	0	0	0
Zadar	11	3	0	2
Zagreb	6	4	1	1
TOTAL	**92**	**79**	**43**	**14**

Source: Croatian Employment Service

Ministry of Economy, Labour and Entrepreneurship launched a public tender for "Cooperative entrepreneurship" project for 2009, in which the Ministry donated a support for Incitement of development for cooperatives that promote socially cooperative entrepreneurship measure (Measure 4.4.). Based on the public tender, two cooperatives received financial support, which enabled self-employment of around 20 treated addicts.

Imprisonment System Administration of the Ministry of Justice conducted a poll among 30 prisoners who were interested in inclusion in the Project activities in 2009. In addition, treatment officials performed additional expert evaluation of these prisoners regarding their current health and social status in order to include them in complete social reintegration project. Also, psychological testing and vocational guidance for those that applied took place from July to November 2009. For the purpose of medical examination to assess health and work capability of potential candidates, which was conducted by contracted external Occupational Medicine Services, prison doctors made available all medical documentation with latest medical test results. Upon the results of assessment and determined psychological and medical indication, an expert team of the prison system delivered final opinion for each of tested inmates, together with recommended occupation for each prisoner, taking into account their previously expressed interest.

Ministry of Science, Education and Sport is responsible for funding all re-vocational or re-educational trainings in all cases when beginning of training starts inside therapeutic community, social care or prison institution, or when it is conducted in its entirety inside the institution, as well as when it is conducted partly inside the institution and partly after leaving it. During school year 2008/2009, 18 recommendations for training and education were received, out of which 12 users received financial support (3 scholarships received in 2008). Other 6 users (from penal system) didn't start education or didn't even contact educational facilities until today. During school year 2009/2010, 27 recommendations for inclusion in the Project were received, out of which 17 scholarships were financially supported, 2 users continued the education (financing was not needed) and due to late registration 7 applications will be financed in 2010. European Computer Driving License (ECDL) courses organized in 3 therapeutic centres of nongovernmental organization „Zajednica Susret" were attended by 44 users.

To summaries, the Report on the Implementation of the Project of Social Reintegration of Drugs Addicts for 2009 shows that measures were implement more intensively, and that considerably more users entered the programme than in previous year. Furthermore, a significantly larger motivation and interest from treated addicts was observed, especially for completion of secondary education and generally for all kinds of education and re-education, upon the recommendation of the Social Welfare Centres and financed by the Ministry of Science, Education and Sport. It was also noted that considerably larger number of addicts was included in the Project based on active policy of employment measures from the National Plan for Employment Incitement 2009-2010, that were conducted by the Croatian

Employment Service. In addition, for the first time two cooperatives for social cooperative entrepreneurship of treated addicts were founded in 2009, which enabled self-employment for 20 drug users, as already mentioned in the previous text.

Yet, during implementation of the Project several problems were identified, which prevented even more users (treated addicts) to join the Project. First of all, a weak coverage of schooling and employment programmes for addicts inside penal system was noted, but also inadequate monitoring of client's progress after they leave the institution. In addition, there is a problem related to non delivery of individual programme monitoring forms to the Personal Data Base (UZDA) on the Project users, which made adequate project implementation monitoring impossible, as well as defining a precise number of rehabilitated addicts included in the Project. Furthermore, there are still problems of insufficient raising awareness among the general public and especially entrepreneurs, lack of partnership among institutions responsible for the implementation of measures at the local level, but also insufficient awareness of potential clients about possibilities for inclusion in the Project and about its benefits. A lack of cooperation between treatment personnel inside penal institutions and the Social Welfare Centres was also noted.

By analyzing the available data, it can be concluded that some additional efforts should be undertaken in order to improve implementation of the Project. In order to better inform treated addicts about the opportunities of the Project and to reach better coverage of the targeted population with the Project activities, there is need for publishing a brochure with all key information about the Project, which will be distributed to treated addicts inside prisons, therapeutic communities, outpatient treatment system and the Social Welfare Centres. It is also necessary to stimulate more active cooperation between Regional Offices of the Croatian Employment Service, local and regional administration and nongovernmental organizations that participate in social reintegration in order to enhance employment of treated addicts and to ensure more active role of local administration in designing and implementation of special programmes related to the social reintegration of drug addicts. Furthermore, it is imperative to adjust the forms for monitoring individual social reintegration programmes and to stimulate their delivery to the UZDA on regular basis, in order to efficiently monitor Project implementation and to define the exact number of treated addicts that used benefits of the Project.

Considering the extremely important role of the Social Welfare Centres in implementing the Project, it is necessary to organize education for project coordinators, where role of these centres should be defined more clearly, not only in relation to monitoring of individual progress and providing information about the Project but also regarding other social services that they should provide. Due to poor coverage of addicted inmates with educational and employment programmes but also due to difficult monitoring of their progress after release from prisons, it is necessary to consider possibilities to modify and adapt the Project according to the needs and circumstances in the prison system.

In cooperation with public media, employer associations and unions, it is necessary to organize various meetings, educational broadcasts, etc., in order to sensitize the public and especially entrepreneurs to view the Project as one of the most effective possibilities for reintegration of drug addicts into society. Continuous educations at the regional level should be organized, to enable exchange of information about the progress and results of the Project as well as to advance cooperation among responsible institution at the national and local level.

In addition to the interventions of public institutions in the frame of the Project of Social Integration of Drug Addicts, some therapeutic communities have counselling centres that provide different types of assistance before entering and after completing their rehabilitation programmes. Post-rehabilitation assistance, among others, provides assistance and advices

in finding accommodation, job and realisation of other social and legal rights. Similar services are provided to drug addicted inmates which are prior and after their release included in the different programmes of prison and probation systems aiming at their social reintegration, based on the provisions of the Law on the Enforcement of Prison Sentence (see Chapter 9.6).

9 Drug-related crime, prevention of drug-related crime and prison

There were no changes regarding the data sources and type of data collected by different authorities which were described in the last year's Report. With the purpose of better understanding the issue, the introduction should contain the basic explanations of the terms used in the text. *Narcotic drugs abuse* can be defined as any illegal trafficking in illicit drugs. For this reason, our legislator in Article 173 of the Criminal Code under the title "Narcotic Drugs Abuse" predicted all modalities of narcotic drug misuse, and criminal description of this act contains any unlawful behaviour stipulated in the Conventions signed and ratified by the Republic of Croatia. Two modalities of this offence are important for the purposes of this Report. The first is the possession of a narcotic drug for personal use, the mildest form of this offence. This form of the offence envisages the sentence in form of a fine or up to 1-year imprisonment. The second modality of this offence exists in the basic and qualified forms. The basic form regulates illegal production, modification and sale of a narcotic drug and envisages the sentence of at least a 3-year (to 15-year) imprisonment. The qualified from refers to identical acts but committed within a group or an organization and envisages the harshest sentence of at least a 5-year imprisonment to long-term (20- to 40-year) imprisonment. Narcotic drugs are any substances of natural or artificial origin, including the psychoactive substances from the List of narcotic drugs, psychotropic substances, plants used to produce narcotic drugs and substances that can be used in the production of narcotic drugs (precursors).

The treatment of inmates addicted to drugs is a part of the National Strategy on Combating Drugs Abuse. The basic aim of the National Strategy with regard to the prison system is defined by the acceptance of the mutual relationship between prisons, penitentiaries and the social community as a whole, since prisons are places where inmates spend a limited, sometimes even a very short amount of time, during which any programmes implemented in the community and applicable in prison conditions must be made available to them. With regard to the significance of special programmes in the treatment of inmates, efforts are made continuously to improve their quantity and quality. For that purpose, in 2009 a new department was formed at the Treatment Service at the Central Office of the Prison Administration: Department for Special Programmes. The task of this department is to participate in the recognition of the need for special programmes, to create new programmes, to monitor their implementation, to take measures and to set standards and priorities for the improvement of new programmes.

9.1 Drug-related crime

Drug law offences

If we look at the statistics of the Ministry of Interior for 2009, a total of 7 063 criminal offences (the Criminal Code, Article 173 – Abuse of Narcotic Drugs) related to narcotic drug abuse and trafficking were reported. The average share of this type of criminal offence in the overall criminality on the territory of the Republic of Croatia during 2009 was 9.6%. A downward trend in reported criminal offences related to narcotic drug abuse and trafficking, which started in 2007, continued in 2009 when their number decreased by 10.4% compared to 2008.

When looking at the territorial distribution of reported criminal offences, out of the 20 Police Districts[34] countrywide, 9 of them recorded decrease in this type of crime which was the most significant on the territory of Virovitica-Podravina, Istria and Koprivnica-Križevci County, whilst the major increase was noted in Požega-Slavonija, Dubrovnik-Neretva and Sisak-Moslavina County.

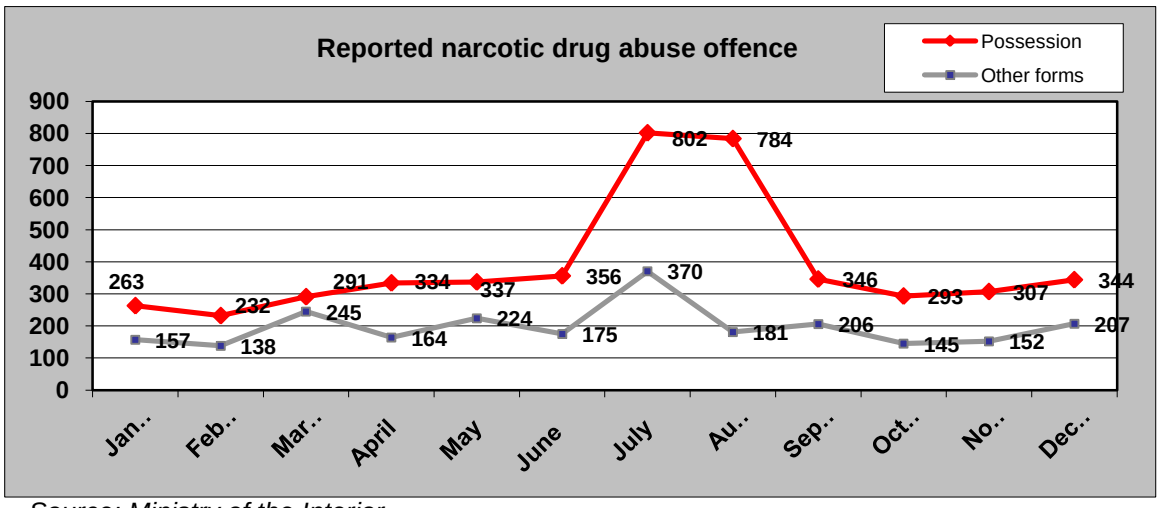
Global structure of criminal offences related to abuse of narcotic drugs in the territory of the Republic of Croatia shows that out of the total number of 7 063 reported criminal offences, 2 373 or 33.6% of them refer to more complex criminal offences (e.g. trafficking, production, enabling drug use to other person etc.), whereas 4 690 criminal offences refer to drug possession which makes 66.4% in the total number of reported criminal offences (ST 11, 2010). Reports for both possession and qualified forms of narcotic drug abuse offence were mainly related to cannabis products, followed by heroine, amphetamines and cocaine.

In 2009, police reported 5 019 persons for narcotic drugs abuse criminal offence (ST 11, 2010). The largest number of offenders reported for that type of offence were at the age of 21-25 (26%), followed by the 29-39 (25%) and 25-29 (21%) age groups, while the offenders between 18-21 years of age participated with 16%. As far as gender structure is concerned, most persons reported for criminal offences during 2009 were men (89 %), whereas women were represented in 11 % of the reported cases.

When it comes to the number of foreign citizens reported for narcotic drugs abuse offence in the Republic of Croatia, in 2009 there were 1 196 (2008:1 155) foreign citizens reported for this type of offence, usually during the summer months when the most tourists visit our country. In the most cases they were caught in a possession of small quantities of drugs for personal use, usually while entering country. According to the Croatian Statistics Bureau, 10.93 million tourists visited Croatia in 2009. Slight increase in number of foreigners that were reported for narcotic drug abuse offence, which are usually of younger age, could to the certain extent be explained with the fact that Croatia has during the recent years become very attractive and popular holiday destination.

Figure 9.1 gives an overview of reported narcotic drugs abuse offence during 2009 where it is clearly visible that possession of narcotic drugs is reported more frequently during the summer.

Figure 9.1 – Reported narcotic drugs abuse criminal offence by months, 2009



Source: Ministry of the Interior

[34] Croatia is divided into 20 administration units (counties) and every county has its own police department authorised for the territory.

Based on the data obtained from police departments, there were submitted 4 552 misdemeanour charges (the Law on Combating Narcotic Drugs Abuse) against the total of 4 500 persons. During 2007, the number of misdemeanour charges related to narcotic drug abuse also started to decrease, and in 2009, it decreased by 2.2% compared to the year 2008.

To further discuss this issue, in the text bellow there are presented data of the State Attorney's Office which possesses very comprehensive database on persons reported for criminal offences (by age groups: adults, young adults and adults), the number and structure of criminal offences in relation to different modalities of a specific offence, the number of withdrawn criminal charges or criminal charges resolved on the opportunity principle, the number of terminated proceedings, the number of charged persons, the number of convicted persons, the number of filed complaints and their outcome. Data of the State Attorney's Office differ from figures of persons reported for criminal offences of the Ministry of the Interior as besides the police, every citizen and legal entity can report any criminal offence.

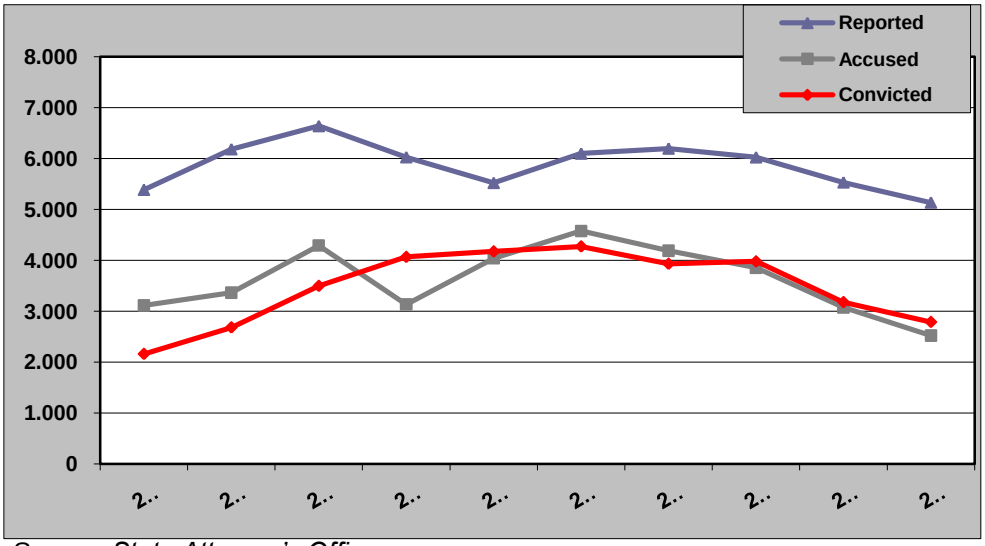
In 2009, to the State Attorney's Office there was reported 5 341 person (4 342 adults, 793 young adults[35] and 206 juveniles) for criminal offence of abuse of narcotic drugs[36], which is 7.1% less than in 2008 and a continuation of a decreasing trend since 2007. It has to be stressed that in the period of last 9 years, this is the lowest number of reported persons for this offence. Although these figures are encouraging, drug-related crime always has its dark number, and therefore detected and reported criminal offences represent only certain percentage of that type of crime.

Similar like previous years, most persons were reported for possession of narcotic drugs, which in total crime related to abuse of narcotic drugs participates with 71.7% (3 830). If we focus on the possession of narcotic drugs as the mildest and prevailing form of criminal offence related to the abuse of narcotic drugs, we can again observe a declining trend (Figure 9.1) as a result of recent practice of state attorneys which tend to reject reports for such offences due to its 'insignificancy' or according to the purposefulness principle (please consult Chapter 9.3 for more details). In the total drug related crime, possession participates with 72.6% in the population of adult offenders and with 76.7% at drug offences committed by juveniles. Other, more severe forms of that criminal offence are also in decline. However, there has been noted a slight increase (15.3%) of person reported for Paragraph 2 of the Article 173. These data indicate that brunt of Croatian drug policy is nowadays more on detection of persons that without authorization manufacture, process, sell or offer for sale, buy for the purpose of resell, keep, distribute or in any other way put into circulation substances or preparations which are by regulation proclaimed to be narcotic drugs, rather than on processing drug addicts for small quantities of drugs. In that way, state can more effectively influence on decrease of drug supply on the illicit market. On the other hand, data on the 74.4% of rejected criminal reports for drug possession witness that drug addicts who are in need are provided with the possibility of treating their addiction.

Out of the total number of reported persons, there were 5 135 adult offenders and younger adults, which contributed to a decreasing trend during last few years. In the reported period, there was also decline of accused adult and younger adult offenders (2 523) for 18% and convicted persons (2 790) for 12.3% compared to 2008 (Figure 9.2).

[35] According to the Act on Juvenile Courts (OG 111/97, 27/98, 12/02), younger adult is a person who has completed 18 years of age but is not yet 21 years old.
[36] Criminal Code, Article 173 – Abuse of Narcotic Drugs (Paragraphs: (1) possession; (2) resale; (3) organised resale; (4) unauthorised production, use of equipment, etc.; (5) giving drug to another for use; (6) giving drug to a child, juvenile, etc.).

Figure 9.2 – Reported, accused and convicted adult persons for abuse of narcotic drugs (2000-2009)



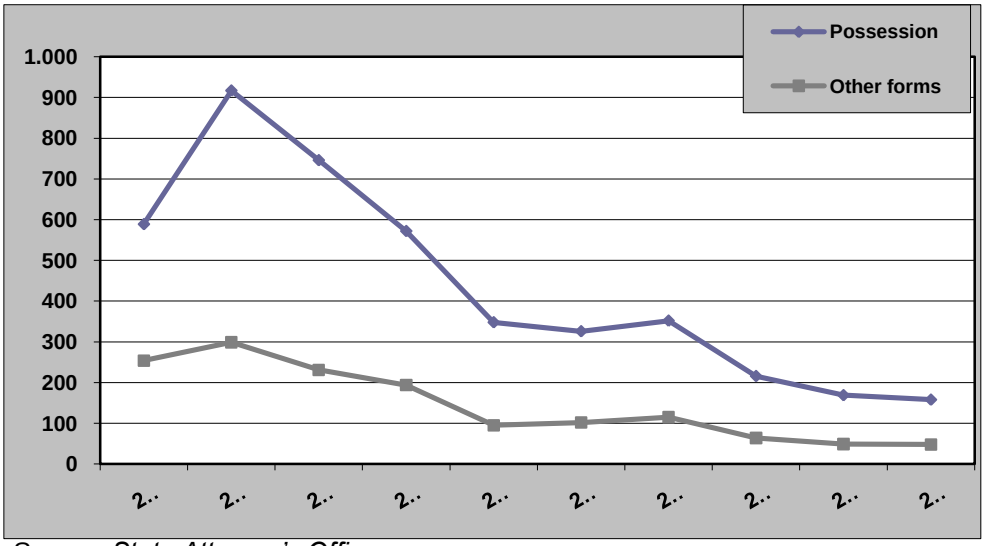
Source: State Attorney's Office

When it comes to sanctions, there were 1 903 decisions on rejection of criminal charges against adult offenders and 2 297 adult persons were charged. Prison sentence was pronounced to 834 reported persons, for all adults convicted for the Paragraph 3 of the Article 173, which referrers to organised forms of this criminal offence, and in very high percentage (98.1%) for adults accused for the Paragraph 2 of the Article 173 – resale. Since these are the most severe forms of this criminal offence, it is logical that in most cases prison sentence is pronounced. A fine was imposed to 503 adult offenders, in all cases for possession of narcotic drugs. There were also 262 safety measures imposed to adult offenders out of which 235 compulsory treatment measures pursuant to Article 76 of the Criminal Code and 27 measures of compulsory psychiatric treatment pursuant to Article 75 of the Criminal Code.

As an additional information, during 2009 there were reported 3 946 younger adults where 20.1% of them were reported for drug-related offences (793). Decrease was also noted in the number of reported younger adult offenders for 14.1%, which is 130 persons less than what was reported in the previous year. For the criminal offence referred to in Paragraph 2, 110 young adults were reported. In 2009 there were 550 decisions on rejecting criminal charges, mostly pursuant to Article 28 of the Criminal Code for the insignificant offence (280 or 50.9%), which is explained in the Chapter 9.3. Slightly lower number of charges was resolved applying the principle of opportunity (239 or 43.5%). The application of the principle of opportunity to young adults is very important, especially the application of Article 64 of the Act on Juvenile Courts, because young adults aged from 18 to 21 are given help and support during the pre-criminal procedure which mainly means compulsory counselling treatment and urine checks. In 2009 there were 226 young adults charged, and for 318 the sentence was pronounced. For 304 or 95.6%of them were convicted. In most cases the sentence was conditional. For 44 young adults the Court decided to apply juvenile sanctions.

Juvenile offenders are specifically monitored group. In 2009, there were reported 3 574 juvenile offenders for various criminal offences, out of which 5.8% or 206 persons were reported for criminal offence related to narcotic drug abuse. The number of reported juveniles as well as of other age groups has been decreasing from year to year (Figure 9.3). While in 2007 there were 280 juvenile offenders reported, and in 2008 218 juvenile offenders, in 2009 there were 206 persons reported, which is 5.5% less than in the previous year.

Figure 9.3 – Juveniles reported for possession and other forms of criminal offence related to abuse of narcotic drugs(2000-2009)



Source: State Attorney's Office

In the reporting period out of 206 reported minors, in 141 cases (68%) a decision on rejection of criminal charges was made, mostly applying the principle of opportunity, and in 51 cases applying the principle of insignificant offence pursuant to Article 28 of the Criminal Code. In addition, during 2009 Councils on Youth imposed educational measures for 48 juveniles and for 7 of them suspension of sentence to juvenile prison. All imposed suspensions to sentence to juvenile prison are related to the perpetrators of criminal offence referred to in Article 173, Paragraph 2 of the Criminal Code.

Other-drug related crime

There is no much information on other reported drug-related crime, e.g. various offences committed under the influence of drugs or offences committed in order to obtain money for the purchase of drugs. The only records that the Ministry of the Interior systematically keeps track of are the records of drivers who have caused traffic accidents under the influence of drugs.

Table 9.1 - Number of traffic accidents caused by drivers under the influence of drugs (comparison 2005 - 2009)

	Number of traffic accidents caused by drivers under the influence of drugs (comparison 2005 - 2008)					
TRAFFIC ACCIDENTS	**2005**	**2006**	**2007**	**2008**	**2009**	**2009/2008 +/- %**
With persons killed	9	15	13	9	11	+22.2
With injured persons	52	47	94	59	56	-5.8
With material damage	13	18	-*	25	31	+24
TOTAL	**74**	**80**	**107**	**93**	**98**	**+5.4**

* Data on traffic accidents under influence of drugs with material damage are not available for 2007.

Source: Ministry of the Interior

As presented in the Table 9.1, in 2009 there were 50 388 traffic accidents countywide out of which 98 traffic accidents were caused by drivers under the influence of illicit substances.

The major part of those traffic accidents ended with injured persons (56) whilst fatal outcome was registered in 11 cases. The rest were traffic accidents with material damage only. In 2009, there was slight increase of traffic accidents that were caused by drivers under the influence of illicit substances if compared to previous year. However, in 2009 there were 35% less traffic accidents caused by young drivers in the age of 18-24 years, which can be contributed to intensive traffic safety measures that include testing[37] drivers of motor vehicles on illicit substances. Out of total number of 20 accidents caused by young drivers, which is one fifth of all accidents 4 accidents resulted with death persons, 12 with injured persons and 4 accidents with the material damage.

Primary activity of both illicit drug smugglers and users is one of the forms of narcotic drug abuse offence. Drug users usually commit secondary criminal offences in the area of property crime in order to support their addiction. Quite often they commit burglaries in the pharmacies and medical centres as well as forgeries of medical prescriptions to obtain methadone and possibly other medicines. In 2009, there were committed 95 aggravated larcenies: 38 in pharmacies, 33 in medical centres and 2 in other health institutions. There were also recorded 7 cases of forgeries of medical prescriptions. Unfortunately, it is not clear how many of those offences were committed by drug users.

Organised criminal groups are usually engaged in other forms of organised crime, corruption, violent crime and money laundering. Special attention is also being given to the early detection of money inflow earned by illicit drug trafficking, since money profit makes the most important segment of illicit drug trafficking, and prevention and combating the laundry of money gained by illicit drug trafficking. Emphasis are on detection of higher levels of the criminal pyramid or persons which are not directly involved in drugs trafficking but rather organize and finance this illicit activity. According to the Anti-Money Laundering Office at the Ministry of Finance, in 2009 there was registered one indictment for one person, one indictment for 3 persons and one invalid conviction verdict for 3 persons for committing criminal offence of money laundering that is connected with criminal offence of narcotic drugs abuse.

Distribution of different offences committed by drug users can be described based on the statistics of the Imprisonment System Administration of the Ministry of Justice. Table 9.2 shows that drug addicts are also specific by the type of offence that they commit. If compared with the rest of prison population, drug addicts more often commit criminal offences related to the abuse of narcotic drugs, larceny and robbery, whilst they are less represented among the perpetrators of criminal offences against life and limb, against sexual freedom and sexual morality, and other criminal offences. During 2009, drug addicts continue to mostly participate in committing qualified (complex) forms of narcotic drug abuse criminal offence (49.5%), followed by property crime where larceny and affricated larceny takes 20% and robbery 14.8%.

Table 9.2 – Drug addicted inmates by criminal offences in 2009

Criminal offences (Articles of the Criminal Code)	Number of inmates					
	Prisoners		Detainees		Sentenced for misdemeanour	
	*N1**	*N2***	*N1*	*N2*	*N1*	*N2*
Abuse of narcotic drugs – possession (Art. 173, p.1)	44	45		57	1	
Abuse of narcotic drugs – other (Art. 173, p.2-6)	334	325	1	380		
Larceny, aggravated larceny (Art. 216, 217)	106	181		194		
Robbery (Art. 218, 219)	115	115		124		

[37] More information can be found in the Chapter 9.2.

Murder, aggravated murder, manslaughter (Art. 90-92)	22	22		17		
Bodily injury (Art. 98-101)	14	13		21		
Rape (Art. 188-193)	4	11		8		
Fraud (Art. 224)	10	8		9		
Other	45	60		104		
Total	694	780	1	924	1	
	1474		925		1	
TOTAL	**2400**					

* *N1 = inmates with security measure of obligatory treatment*
** *N2 = inmates without security measure of obligatory treatment*

Source: Ministry of Justice, Imprisonment System Administration

9.2 Prevention of drug-related crime

Similar like previous years, during 2009 the measures targeted at drug supply reduction on the illicit drug market were undertaken through combating organised illicit sale and distribution of drugs in the Republic of Croatia, directing activities of specialised police officers toward organised criminal groups involved in illicit drug trafficking, preventing the organisation of open narco-scenes and combating street trafficking of smaller quantities of narcotic drugs (street reduction with maximum availability reduction), continued drug-testing of drivers in road traffic (preliminary testing) together with additional training of traffic police and provision of the equipment required for its implementation. In order to prevent smuggling of illicit drugs into the Republic of Croatia and through its territory there have been continuously carried out measures and actions with the international character: international controlled deliveries, previous international police investigations, carrying out international operations, implementation of regular and intensified supervision of state borders, measures for improving passenger control and traffic control at border-crossings (road, railway, river), in airports and ports, formation and use of well-equipped (material-technical means, narcotic detection dogs etc.) border police teams specialised for combating illicit drug trafficking, intensified measures targeted at prevention of illicit drugs smuggling at water borders, continuous trainings on the drug-related topics of border police officers (sea) as well as drug dog guides, assessment of public air traffic (scheduled flights and general air traffic) with the aim of detecting risk flights and other activities.

Furthermore, all measures and activities at the border were conducted independently by police or in cooperation with customs, based on the Agreement on cooperation between police and customs. As one of the results of that cooperation it was developed an assessment of flights in public traffic (regular flights and flights of general aviation) with the aim of detecting flights with risk of drug smuggling and undertaking intensified measures of preventing such criminal activities. Due to high potential of smuggling drugs by ships or other vessels, continuous profiling and risk assessment of ship cargo is being done, especially in the biggest cargo terminal in Croatia, at the port of Rijeka. Besides the cargo, there was also analysed flow of goods and passengers in railway and truck traffic. However, in all related activities accent was on targeted surveillance of the border, in order not to negatively influence on openness of the border as well as the tourist and maritime orientation of the country.

Police continued with their attempts to be visibly present at the places where young people meet, socialise and have fun, and in this way prevent establishing open narco-scenes. Their preventive presence is in particularly important in the vicinity of schools in order protect the youngsters from aggressive drug supply and drug offer. Project “Police in the Community” introduced a contact police officer in majority of residential quarters as a part of uniformed

police which should base their work on daily communication with community members in order to jointly prevent and solve problems connected with crime, including prevention of drug-related crime.

As reported previous years, Ministry of Interior opened several “Information centres” (Zagreb, Bjelovar, Varaždin and Karlovac), where specialised and experienced police officers participate, among others, in drug prevention activities together with all other relevant services in the community.

When it comes to the prevention of driving offence committed under the influence of drugs, traffic police officers in 2009 offered preliminary testing on illicit substances to 1 458 drivers, which is 58.2% more than in 2008 (849). Since 204 driver refused to be tested by preliminary testing device, out of 1 254 tested drivers, 354 were positive for the presence of drugs in the body. Out of 140 drivers who have agreed to provide blood and urine samples for analysis of presence of illicit drugs, in 18 cases drugs were confirmed compared to 32 positive cases in 2008. The relationship between the total number of drivers tested and submitted misdemeanour charges (for refusing preliminary testing, for refusing blood and urine testing and for determined presence of narcotic drugs in the body) is 30.3%.

9.3 Interventions in the criminal justice system

Possibilities for rejecting report for drug related criminal offence, suspending further prosecution, suspending sentence and different measures (e.g. obligatory treatment of drug addiction or psychiatric treatment) that may be pronounced by the Court were in detail described in the last’s years Report and there were no major changes regarding legal provisions in 2009. Figures on rejected criminal reports for all categories of offenders (juveniles, young adults and adults) and other alternatives to imprisonment are presented in the Chapter 9.1.

When it comes to reasons for rejection of criminal reports against adult perpetrators, State Attorneys usually decide to apply Article 28 of the Criminal Code which means criminal charges are solved by rejection due to a minor significance of the criminal offence. In these cases adult offenders were reported to the State Attorney for the first time for a possession of small quantities of drugs. In 2009, there were in total 2 594 rejected criminal reports out of which 1 930 rejections were based on previously mentioned Article 28 of the Criminal Code. When using this possibility, it is taken into account that requests for initiation of minor offence proceedings have been submitted to the competent Magistrates Court against those persons. State Attorney Offices also apply the principle of insignificant offence pursuant to Article 28, when the perpetrators are foreigners who visit Croatia during summer months and bring small amounts of drugs for personal use.

Criminal charges can also be rejected based on Article 174 of the Criminal Procedure Act when there are no elements of an offence or reasonable doubt etc.

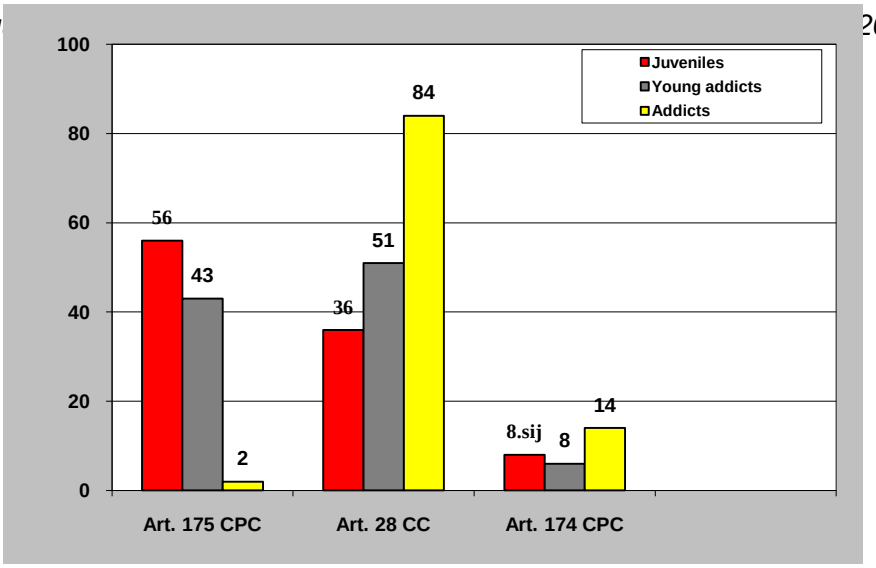
The Criminal Procedure Act in its Article 175 foresees so-called *opportunity or purposefulness principle*, giving the possibility to the State Attorney to conditionally postpone the prosecution in the case of criminal charges for an offence that is punishable by a fine or imprisonment of up to 3 years (a fine or imprisonment of up to 5 years to a minor). The principle of opportunity is mainly applied by State Attorneys specialized for young people and their procedure is in accordance with the intentions of the legislator regarding the treatment of juveniles and young adults. Following the opportunity principle, Article 64 of the Juvenile Court Act is usually applied according to which the State Attorney orders young adults the compulsory treatment measure for quitting drugs and other forms of addiction (it includes

counselling and urine tests). These procedures proved to be positive because young people get an insight, that is self-insight into their behaviour. The principle of opportunity is an important mechanism for young adults as well as for juveniles because criminal charges can be resolved in pre-criminal procedure; the procedure starts very soon after committing the crime, and counselling treatment for the juveniles is effective in achieving educational purposes.

Therefore, taking into account the positive experiences of the Department of Juvenile Delinquency at the State Attorney Offices, the same proceedings should be applied to adult persons i.e. persons older than 21 in all cases in which criminal procedure is not required. Figure 9.4 provides overview of all possibilities for rejection of criminal reports for abuse of narcotic drug related in 2009, by age groups.

Figure 9.4 - Rejected criminal charges for abuse of narcotic drugs by legal provisions and by age groups, 2009

Fig *2009)*



Source: State Attorney's Office

It is important to take preventive measures when such criminal offences are involved because drug abuse and drug addiction lead to committing other criminal offences mainly against property.

9.4 Drug use and problem drug use in prisons

In 2009, there was a total of 17 997 inmates of all categories[38] in the prison system. In the total number of inmates, there were 2 568 inmates (14.3%) with disorders caused by drug abuse. Majority of them were prisoners (1 474), followed by detainees (925), misdemeanour (168) and 1 juvenile.

A total of 857 new persons addicted to psychoactive drugs were sent to serve prison sentence in 2009, which is one third of all drug addicted inmates (N=2 568) in the prison system during that year. Out of those, 46.6% were sentenced to compulsory addiction treatment as a security measure. As in the previous years, the addiction (or abuse directly related to criminal activity) in most prisoners, or 53.4%, was established by the Diagnostics

[38] Formal-legal status of inmates: prisoners, detainees, remand custody, misdemeanour and juveniles.

Department and/or the expert team of the penitentiary/prison. Although a constantly higher rate of criminal recidivism in addicts compared to other inmates is well-known, the increasing trend of the number of criminal recidivism among addicts is still salient. Thus in 2009, for the first time in the addicted prison population, the number of those who had already served a prison sentence exceeded 50% – it was as high as 61.38% (Table 9.3).

Table 9.3 - Number of inmates addicted to psychoactive drugs sentenced in the given year (2007-2009)

Year	Number of addicts with security measure		Number of addicts without security measure		TOTAL		First time prison sentence	
	M	*F*	*M*	*F*	*M*	*F*	*M*	*F*
2007	389	19	641	7	1 030	26	434	14
TOTAL	**408**		**648**		**1 056**		**448**	
2008	433	24	578	23	1 011	47	488	30
TOTAL	**457 (>12%)**		**601 (<7.3%)**		**1 058 (>0.2%)**		**518 (>15.6%)**	
2009	377	22	444	14	821	36	307	24
TOTAL	**399 (<12.7%)**		**458 (<23.8%)**		**857 (<18.9%)**		**331 (<36.1%)**	

Source: Ministry of Justice, Imprisonment System Administration

Addicts, or persons who abuse drugs, are one of the most numerous and the most challenging groups of inmates in terms of security and treatment. The characteristics of this group of prison population are the following:

- addiction or drug abuse is directly related to criminal offences
- the percentage of this category of inmates in the prison population is continuously high (about 15%)
- the recidivism rate is higher than in the general prison population
- these inmates are generally more prone to risky behaviour in prison compared to other inmates (self-injury, suicide attempts, conflicts with other inmates, attempts to smuggle in drugs, etc.)
- on average, they are younger than the rest of the prison population
- they are more prone to health problems (hepatitis, HIV, and generally poorer health due to long-term drug abuse).

All inmates sentenced to six or more months in prison have to undergo a psychophysical examination administered by the Diagnostics and Programming Department. Apart from the general terms of prison sentence, an individual treatment programme for addicted inmate is created according to the examination findings. According to the data from ST 12 (2010), the Department handled 1 916 inmate cases in 2009. According to an anonymous survey, 26.3% of surveyed inmates took an illicit drug once in their lives, mostly cannabis (19.4%), while an equal number of inmates took heroin and cocaine. The lifetime prevalence in 2009 was slightly higher than in 2008 when 23.4% of respondents took any illicit drug once in their live. The prevalence of abuse of any drug in the last year was 12.3%, and 5.7% in the last month, both lower than in 2008. 7.6% of surveyed inmates took illicit drugs at least once per week or regularly (13.4% in 2008); usually heroin (4.8%) and cannabis (3.2%). The survey also showed that 4.9% of inmates serving a sentence of more than six months took drugs (usually heroin) intravenously (6.8% in 2008).

As in the previous year, addiction, or the abuse of a particular type of drug, was equally prevalent. Thus inmates, or detainees, were primarily addicted to opiates in about 40% of

cases, to cannabis in 14% of cases, and to sedatives and hypnotics in 3.5% of cases (Table 9.4).

Table 9.4 – Number of addicted inmates in 2009 according to psychoactive drug type

Type of psychoactive drugs	Number of prisoners during 2009				
	Prisoners	Detainees	Sentenced for misdemeanour	Minors	TOTAL
Opiates F11	578	387	62		1027
Cannabinoids F12	206	141	34	1	382
Sedatives and hypnotics F13	50	32	3		85
Cocaine F14	55	35	2		92
Stimulants F15	97	33	7		137
Hallucinogens F16	2	5	1		8
Solvents F18	8	10	3		21
Polydrug use and other F19	478	282	56		816
TOTAL	**1 474**	**925**	**168**	**1**	**2 568**

Source: Ministry of Justice, Imprisonment System Administration

Regarding age of inmates, 70.5% of addicted inmates, or almost three quarters of the population, was aged 21 to 35. This information additionally stresses the gravity of the problem, since those are about 1 800 persons in their most productive period of life, but whose bio-psycho-social functioning has been completely damaged or significantly impaired due to drug abuse, as well as the lifestyle of addiction and crime (Table 9.5).

Table 9.5 – Age and gender of inmates addicted to psychoactive drugs (2007-2008)

Age and gender of prisoners	Number of inmates					
	Prisoners		Detainees		Sentenced for misdemeanour	
	M	*F*	*M*	*F*	*M*	*F*
<16	0	0	0	0	0	0
16-20	16	1	46	-	4	-
21-25	198	8	163	16	26	2
26-30	435	22	222	14	40	
31-35	374	19	205	15	50	1
36-40	214	8	158	7	29	-
>40	166	14	68	11	16	-
Total	1 403	72	862	63	165	3
	1 475		925		168	
TOTAL	**2 568**					

Source: Ministry of Justice, Imprisonment System Administration

Since the prison population constitutes a combination of several high-risk subpopulations – especially addicts that can spread viral hepatitis B and C – and that their serologic status is difficult to monitor outside the prison system, a research was conducted to investigate the prevalence of HBV and HCV infection in the prison population. The results clearly showed an extremely high percentage of the prevalence of these viruses, especially in addicts (up to 50%) compared to the general population (HBV-11%, HCV-1.2%). More information can be found in the Chapter 6.1.

In 2008, an *education on narcotics abuse* was carried out as a part of a basic and supplemental course for prison police officers and heads of treatment departments in prisons and penitentiaries. Treatment departments officials continuously organised educational courses for inmates and youth in the context of their treatment groups, as a part of special programs for addicted inmates in prisons/penitentiaries and youth given educational measures.

9.5 Responses to drug-related health issues in prisons

Inmates, detainees and those convicted of a misdemeanour are provided healthcare that includes a physical examination, counselling, psychiatric help, testing for infectious diseases (hepatitis, HIV) and substitution treatment, i.e. "drug-free" treatment. They are given education and psycho-social help in the form of individual or group work, carried out typically by treatment officials, and sometimes expert associates acting as moderators and supervisors of programmes and the association. The main method is a therapeutic community modified for prison conditions. In penitentiaries and some prisons, model Former Addict Clubs were formed.

In semi-open penitentiaries Lipovica-Popovača, Požega and Turopolje, as well as in the open penitentiary Valtura, addicts are treated in the so called "drug-free" departments. This form of treatment implies the existence of a therapeutic contract with the inmate, abstinence control, counselling, work therapy and organised free time of addicted inmates, along with other general treatment methods.

In the prison system, the opiate agonist therapy is continuously present, primarily in the sense of rapid and slow detoxication. As a substitution drug, methadone (Heptanone) had been used exclusively until 2007. To harmonise the treatment of inmates in the prison system with the treatment of addicts in the public health system, another opiate agonist was introduced in the prison system in 2007 – buprenorphine (Subutex, Suboxon), which has since been used for the detoxication of patients addicted to opiates, but also as a maintenance therapy. Unlike in buprenorphine therapy, which is used for detoxication and maintenance in all inmate categories, for addicted inmates who previously underwent substitution therapy the methadone doses were gradually reduced and discontinued during the prison sentence or before the prison sentence, and is usually not prescribed to inmates that serve their sentences in penal institutions.

With regard to all inmate categories, it is evident that on the annual level the opiate agonist detoxication was prescribed to 903 patients in 2009 – methadone was used in 39.2% of cases, and buprenorphine in 60.8% of cases (Table 9.6). Methadone was used more in the detoxication of detainees (71.5% of methadone therapies was for detainees), while detoxication using buprenorphine was prescribed to inmates more (54.4%). Before the introduction of buprenorphine, opiate agonist maintenance therapy was prescribed mostly to detainees and prisoners, while inmates serving their prison sentence received methadone maintenance therapy only in special cases. It has to be noted that with the introduction of buprenorphine, the percentage of prisoners undergoing opiate agonist maintenance therapy increased significantly.

Table 9.6 - Number of inmates addicted to psychoactive drugs prescribed methadone or Subutex/Subuxon during clinical detoxification in 2009

Detoxication with	Prisoners		Detainees		Sentenced for misdemeanour		Minors		TOTAL	
	M	*F*	*M*	*F*	*M*	*F*	*M*	*F*	*M*	*F*
Methadone	71	4	228	25	25	0	0	0	324	29
Subutex / Subuxon	280	19	236	12	3	0	0	0	519	31
TOTAL	351	23	464	37	28	0	0	0	843	60
	374		501		28		0		**903**	

Source: Ministry of Justice, Imprisonment System Administration

In 2009, there were 582 of inmates receiving methadone and buprenorphine therapy, out of which as much as 79.9% received buprenorphine therapy (Table 9.7). Regarding methadone maintenance, the trend of selective application to the most extreme clinical cases was maintained, and thus methadone maintenance was prescribed only to 20.1% of inmates addicted to opiates in 2009. Both methadone and buprenorphine were prescribed to addicts sentenced to compulsory addiction treatment in 75% of cases in 2009.

Table 9.7 - Number of inmates addicted to psychoactive drugs prescribed methadone or Subutex/Subuxon maintenance in 2009

Maintainance with	Security measure (court decision)		Upon the decision of prison expert team		TOTAL	
	M	*F*	*M*	*F*	*M*	*F*
Methadone	83	4	27	3	**110**	**7**
Subutex / Subuxon	348	3	112	2	**460**	**5**
TOTAL	431	7	139	5	**570**	**12**
	438		144		**582**	

Source: Ministry of Justice, Imprisonment System Administration

As a follow-up to serologic tests based on the inmates' informed consent, the *Counselling Centre for Viral Hepatitis* was founded in 2007 by the Department of Internal Medicine of the Prison Hospital. It provides education in penitentiaries and prisons on the infection methods of these viruses, means of protection and inoculation. The organisation, operating plan and programme of the Counselling Centre was created according to the recommendations of the National Committee for Combating Viral Hepatitis, which made a Consensus that involved some leading Croatian experts in this field. The Counselling Centre provides education, individual counselling, testing of inmates for hepatitis and HIV marker presence (diagnostics), and additional programmes that include specific prevention, therapy and final treatment of inmates with chronic hepatitis, followed by an evaluation of the success of the treatment.

In 2009, the following activities were carried out in the Counselling Centre: the treatment of chronic hepatitis C using pegylated interferon of 21 inmates that started in 2008, application of 533 doses of vaccine against hepatitis B, collection of 160 blood samples to be tested for hepatitis and HIV, completion of pre-therapy processing of 20 patients who needed to start a pegylated interferon therapy. A total of 670 patient examinations were carried out in the Counselling Centre clinic.

Since the percentage of addicted inmates remains at around a third of the prison population (32% in 2009), the efforts of the Prison System Administration are focused on the strengthening of the partnership with state organisations and associations in order to meet the current needs of this category of inmates, and their parole and post-penal release.

As a consequence of the intensification of penal policies, and, concerning drug abuse, amendments to the Penal Code (October 1, 2006) and retributive philosophy of punishment, the prison system was overcrowded, and its conflicted role of simultaneous punishment and rehabilitation was exacerbated. Therefore, the objective difficulties in the implementation of addiction treatment are the following: insufficient prison and penitentiary capacity due to an increase in the prison population; the resulting lack of work, educational or specific treatment activities; a more difficult inclusion of families in the described prison conditions; understaffed prison clinics. Some limitations of the implementation of addiction treatments in prison conditions are the following: a short and/or unpredictable prison sentence (detention, misdemeanour, short sentence), as well as a low intrinsic motivation for participation in treatment programmes. A separate socio-therapeutic institution in the prison system, intended exclusively for the treatment of addicted inmates, is required. There is also the lack of a more efficient support of centres for disease prevention, association and the social community in the implementation of addict treatment serving their prison sentence and in the organisation of post-penal admission.

As a part of inmate treatment, a new Agreement was signed with the "Zajednica Susret" Home for Addicts, detailing cooperation on the project of phsycho-social rehabilitation of addicted inmates during parole. The cooperation with this association has been carried out on the level of the entire prison system.

To harmonise the treatment procedures used by physicians in the prison system and those used by physicians in the public health system, prison physicians continuously use a recommendation in the form of history-taking on the course of treatment during a prison sentence to refer prisoners after release or during parole to county or municipal centres for the prevention of addiction, in cooperation with the Croatian Institute for Public Health.

In 2009, a permanent increased control of the supply of opiates in penitentiaries and prisons was carried out. Controls for the prevention of drug supply were carried out on each entry of persons and objects in penitentiaries/prisons, after the return of inmates from their home leave, during visit hours, on receiving parcels for inmates, surveillance during the inmates' walk, as well as during routine searches. In 2009, 187 373 thorough searches of persons and 18,864 room searches were carried out, resulting in the discovery of 1 842 tablets of psychoactive drugs not prescribed by physicians. Table 9.8 clearly indicates that increased control activities during last several years positively influenced on the lower availability of drugs in the prisons.

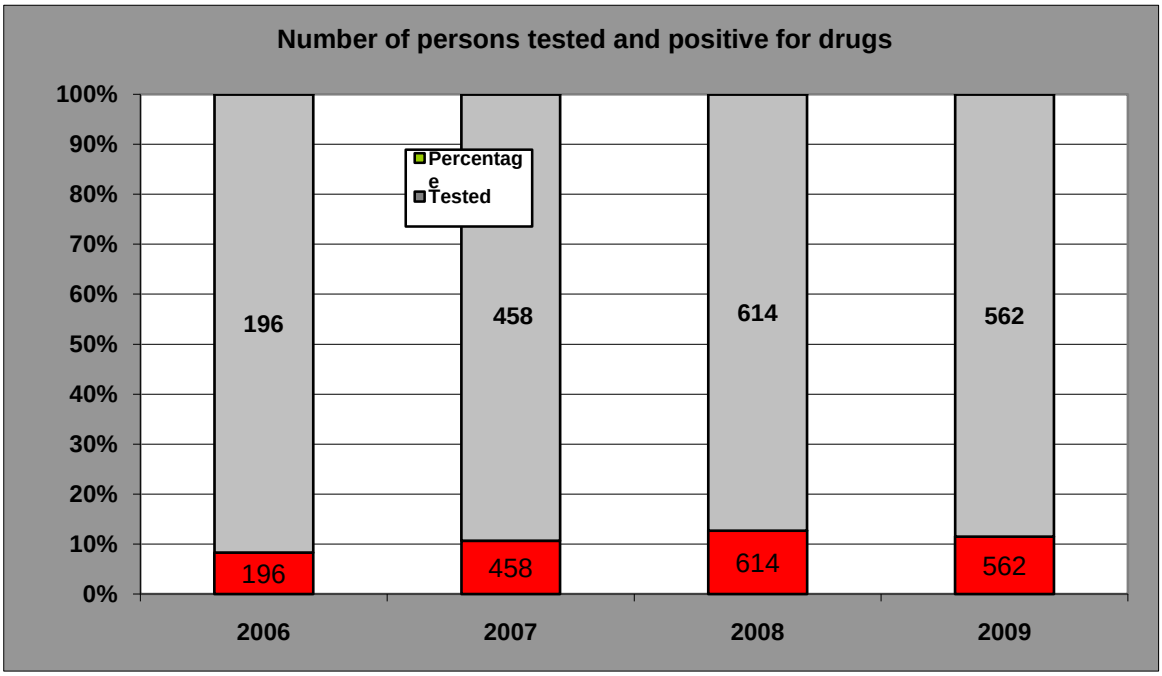
Table 9.8 – Number of thorough searches of persons and rooms (2006 - 2009)

Year	Number of thorough searches for persons	Number of searches for rooms	Number of cases in which drugs were found	Number of psychopharmaca tablets found, not prescribed by physician
2006	136 395	9 411	64	N/A
2007	141 700	11 934	37	N/A
2008	164 452	17 025	23	2 716
2009	187 373	18 854	60	1 842

Source: Ministry of Justice, Imprisonment System Administration

The Protocol on the Testing of Inmates and Minors for the Presence of Addictive Substances in the organism was introduced in January 2006, with an accompanying manual. The Protocol was implemented during 2009 as well, and it followed an established procedure of presumptive and confirmatory testing. In 2009, a total of 15 332 test was carried out: 10 999 for alcohol and 4 333 for other drugs. The total number of inmates tested for alcohol and drugs in 2009 increased by 5.3% compared to 2008, and 23.3% compared to 2007, which was expected considering the increase in the number of inmates. 335 inmates tested positive for alcohol, while 562 tested positive for drugs, usually after the return of inmates from their home leave. The number of inmates tested positive for drugs was reduced by 8.5%, while the number of inmates tested positive for alcohol was increased by 2.4%. For the last few years percentage of tested persons that were positive for drugs ranges between 9-14% (Figure 9.5). Despite this relatively low portion of positively tested inmates and cases when drugs were found during searches, more efforts are going to be undertaken in order to further reduce availability of drugs in the prisons.

Figure 9.5 – Number of persons tested for psychoactive substances and persons tested positive (2006 - 2009)



Source: Ministry of Justice, Imprisonment System Administration

In the monitoring period, two meetings with the representatives of the Ministry of Internal Affairs were held to develop a cooperation and coordinated action regarding the prevention of drug supply in prisons and penitentiaries. There were also twenty cases of initiating a criminal investigation where drugs were found, or where there was a reasonable suspicion that a criminal offence of drug abuse in prisons or penitentiaries had been committed. In 2009, cooperation was agreed upon between the Ministry of Interior and the Ministry of Justice on the standard operating procedure for the exchange of data between the two institutions. The agreement was signed on January 15, 2009 and entered into effect on January 1, 2010. The activity has been continuously implemented to prevent the supply and abuse of drugs in penitentiaries and prisons and the spread of abuse, and to take appropriate health, treatment and security measures against inmates tested positive for drugs. Abstinence control is, therefore, important both for obtaining the relevant information on the "supply" of drugs in prisons and penitentiaries, and the assessment of the quality of therapy programmes that are being carried out.

9.6 Reintegration of drug-users after release from prisons

The role of the prison system in the national Project of Social Reintegration of Drug Addict is described in detail in Chapter 8.

According to the Law on the Enforcement of Prison Sentence[39] (OG 190/03,076/07, 27/08, 83/09), judicial decision on parole may bind the paroled convict to continuation of medical treatment, which is in the case of drug users treatment of drug addiction. Preparing an inmate for the release commences upon his or her arrival in the prison or jail. The inmates are encouraged to participate responsibly in the preparation for the release in the prison or jail and outside of the prison or jail, and particularly to maintain relations with the family, to keep in touch with state authority bodies, institutions and associations and the persons engaging in an organized manner in the inclusion of the convict into life in freedom. Not later than three months prior to the release the prison or jail includes the inmate into individual or group advisory work in connection with the preparing of the inmate for release. At the request of a prison, the Probation Office shall be preparing admission of prisoners after their release in accordance with the law that regulates activities of probation. Upon the release from the prison or jail the released person may get in touch with the competent executing judge for the purpose of assistance and support granting. The executing judge shall co-operate with the social welfare centre which he or she may order by a written decision to undertake the necessary measures of after-release assistance. The after-release assistance is a set of measures and procedures which are applied with the purpose of inclusion of released inmates into life in freedom. Besides providing food and accommodation, advice on the selection of permanent or temporary residence, reconciliation of family relations, seeking employment, completion of professional training, granting financial support for the coverage of indispensable needs and other forms of assistance and support etc., there also has to be provided adequate medical treatment.

Where the special programmes within the treatment department's scope of activities could not be implemented, a cooperation with non-governmental organisations from the local community was encouraged to enable the implementation of the programme in a prison or penitentiary. The advantage of such a cooperation lies in the fact that counselling and monitoring of inmates retains a continuity even after their release. Also, it is possible to include the family or other persons which will provide support to the inmate in his/her abstinence and change of lifestyle. In this way, a cooperation was established in 2009 for treatment and post-penal admission of inmates with the following associations: Terra and “Exodus” in the prison in Rijeka, “Stijena” in the penitentiaries in Glina and Lepoglava, and “Ne-ovisnost” in the prison in Osijek. A cooperation with centres for the prevention of addiction was also established with prisons in Dubrovnik and Gospić.

[39] Zakon o izvršavanju kazne zatvora (NN 190/03,076/07, 27/08, 83/09)

10 Drug markets

Besides the decrease in reported criminal offences related to abuse of narcotic drugs, especially in the sense of possession, in 2009 there were also decreased number of seized drugs. When looking at the structure of reported criminal offences during recent years, it can be noted that proportion of milder form of that criminal offence (possession) is being decreased while reports for more complex for are being steadily increased, from 26.2% in 2002 to 33.6% in 2009. Such development is result of a stronger focus on reduction of organised forms of drug-related crime as a part of strengthen national policy on tackling organised crime at large. Analogously, in 2009 there was set up National Police Office on Combating Corruption and Organised Crime (PNUSKOK) at the Police Directorate of the Ministry of Interior, as a part of restructuring of operational framework of criminal police (see Chapter 1.1). Since Department for drugs now operates within PNUSKOK, in the forthcoming years it can be expected further rise of the share of reports for organised forms of drug-related crime in its total criminality.

During 2009, in cooperation with other European and Latin American countries there were disclosed 9 organised criminal groups involved in drugs trafficking, dealing and other related crime. Such development contributed to decrease of availability of drugs on the Croatian illicit market.

It is very important to emphasise that the drug seizures itself are not a relevant indicator of how successful country is in combating illicit drug abuse and illicit drug trafficking, but what should be also taken into consideration is the number of arrested persons (organisers of smuggling and illicit drug trafficking), as well as the number of crime groups and organisations involved in the crime concerned, and most importantly their criminal processing and confiscation of illegally acquired property. If interpreted stand alone, seizures also can not reflect availability of drugs or structure of drug market in a specific country.

Besides ESPAD, all data presented in this chapter were collected from the regular annual statistics of the Ministry of the Interior.

10.1 Availability and supply

ESPAD survey (ESPAD, 2007) has revealed that cannabis is the most available illicit psychoactive substance (50% of respondents admitted they would obtain it rather easy or very easily), but other illicit substances are available as well, such as ecstasy (30.5% of respondents find it rather easy or very easily available) and amphetamines (28% of respondents find it rather easily or very easily available). Table 10.1 gives details on the responses to the question of the ESPAD survey on how difficult it would be for the respondents to have access to various enumerated legal and illicit substances if they wanted them. There are no available new data on psychoactive substance availability from the national perspective. However, Chapter 2.3 describes results of the study done in Zagreb in 2009 (Manifestations of drug abuse among adolescents), which indicates that large proportion of respondents considers illicit drugs to be easily available, including in the school environment.

Table 10.1 – Assessment of the difficulty to have access to various psychoactive substances (ESPAD, 2007)

Difficulty to have access to the substance in question	SUBSTANCE						
	Cigarettes	Wine	Hard liquor	Cannabis	Ecstasy	Amphe-tamines	Tranquillizers/ sedatives
Impossible (%)	2.5	3.3	4.8	11.1	18.7	18.9	16.7
very difficult (%)	1.6	1.6	3.3	8.2	12.2	12.8	11.1
rather difficult (%)	2.1	2.7	5.7	10.2	11.1	11.9	11.8
rather easy (%)	21.6	19.4	24.2	26.8	17.9	17.4	18.2
very easy (%)	60.4	66.1	51.8	22.7	12.6	10.5	14.1
don't know (%)	11.8	6.9	10.2	21.0	27.5	28.5	28.2

Source: Croatian Public Health Institute

So far there hasn't been detected any significant (major or organised) production of illicit drugs in Croatia, besides growing cannabis plant, mostly for personal use. Therefore Croatia can't be characterised as a producer country but rather as a transit country for smuggling different types of illicit drugs. Geostrategic position of Croatia was already described in the previous Reports. Just to summarise, Croatia is cut by different corridors of the Balkan Route which during the last decade became a circular rout, meaning that different illicit drugs are trafficked between the so called producer countries and consumer countries, in both directions. In the past it was used mainly for trafficking in heroine and to the certain extent in cannabis products (especially cannabis resin), but today there can be found variety of substances like synthetic drugs. However, since during the last few years the production of opiates in Afghanistan has been increasing, further attempts of illicit trafficking may be expected, since the European market is a primary market for the opiates of Afghan origin. Risk assessment of the Croatian police related to the organised illicit drug trafficking indicates that primary threat still lies in organised heroin trafficking via standard trafficking routes and cocaine trafficking, specially through the bulk cargo terminal in the port of Rijeka.

Picture 10.1 – Main trafficking routes in the Republic of Croatia

Source: Ministry of the Interior

In smuggling of heroin traffickers use all forms of transport (roads, railways, sea and air) but larger quantities are usually transported by cars or trucks as this is the shortest road traffic way between the countries of the Eastern and Western Europe. Europol warns that although Turkish organised crime groups dominate heroin trafficking towards and within the EU, ethnic Albanian groups are increasing. Croatian law enforcement agencies closely monitor activities and impact of Albanian criminal groups in our country as well as in the Region.

Major cocaine seizures in the Republic of Croatia are usually related to sea traffic and mostly occur in the port of Rijeka based on results of container profiling, although other Croatian ports (Ploče, Split etc.) are also convenient for smuggling activities. Due to increasing demand for cocaine in the European market, there could be expected further attempts of smuggling larger quantities of cocaine via cargo transport. Besides being smuggled in containers or other ship cargo, Croatian police has also noted smuggling in the sailboat. Smaller quantities of cocaine coming to Croatia are usually smuggled via air traffic (e.g. double bottom of the suitcase) from almost all over the world, but in parcels sent by post, as well. Countries of origin were usually Colombia, Peru, Bolivia, Brazil and Venezuela.

Synthetic drugs such as amphetamines and amphetamine derivatives (ecstasy tablets are seen less frequently then before) are smuggled in various ways usually from Netherlands and Belgium, and less frequently from Eastern European narco-markets. Taking into account forms in which they appear (powder, tablets etc.) they can be easily smuggled in every hidden space of the any vehicle or even in the private luggage. Occasionally they are smuggled though the international express mail service.

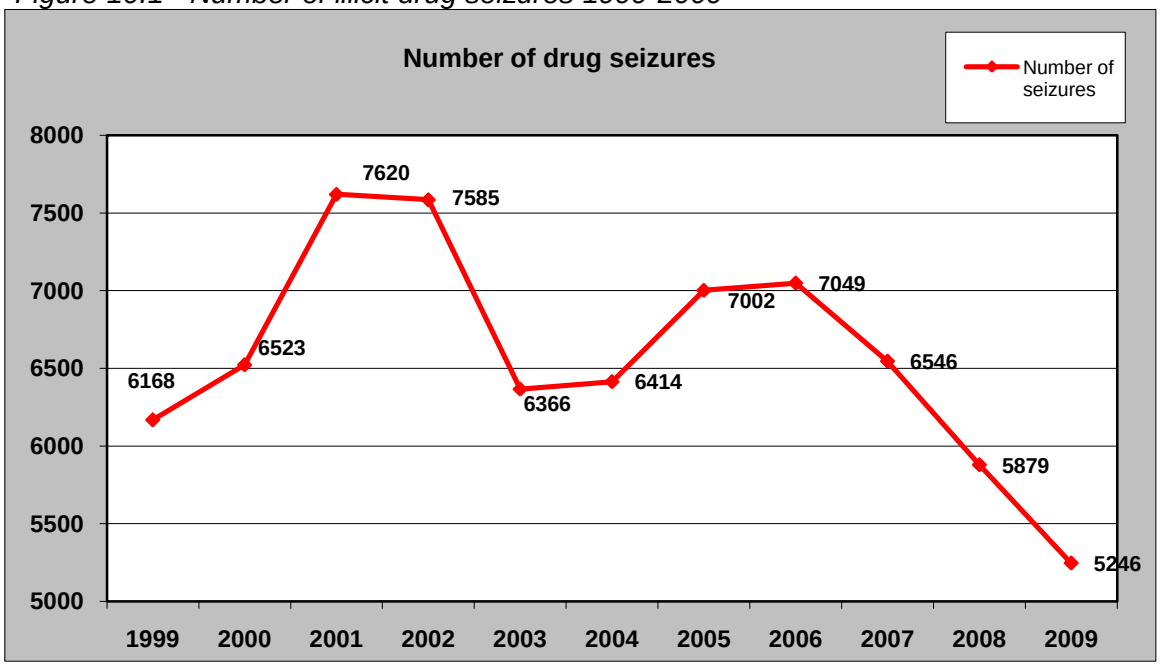
Herbal cannabis and cannabis resin are trafficked in smaller quantities during the summer tourist season, when foreign tourists, mostly from the Western European countries, bring them into Croatia, usually for their personal use. On the other hand, larger quantities of cannabis products are trafficked by road from the territories of our neighbouring (Serbia, Bosnia and Herzegovina, Montenegro), also mostly transit countries, and in most cases are intended for the Western European market. In 2009, there was a case of a large seizure when 96 kg of cannabis resin were trafficked from Turkey through Bulgaria, Serbia and were seized at the entrance to Croatia, and final destination was Germany and Netherlands. In another case, 25 kg of herbal cannabis seized in Croatia were smuggled from Kosovo through Montenegro and were intended to Germany. Herbal cannabis originates mostly from Albania and Kosovo, whilst cannabis resin usually comes from Morocco and possibly from South Western Asia.

10.2 Seizures

During 2009, there were 5 246 seizures of all types of illicit drugs, which is 10.8% less if compared to the previous year. As this is the third year in a row with decreased number of seizures by approximately 10%, we can note a steadily downward trend. It has to be noted that the aforementioned total number of seizures in 2009 differs from the sum of all seizures shown in the Standard Table 13 (2010), which makes 4 410 seizures. The reason for such inconsistence is the fact that besides categories of illicit drugs provided in the ST 13, at the national level there also registered other substances (e.g. opium poppy chrysalis, morphine, methadone, other drugs from the list of illicit drugs and psychotropic substances, etc.).

Having observed the number of seizures in the period of 1999 – 2009 (Figure 10.1), the largest number of seizures was in the year 2001, whilst the previous year recorded the lowest number of seizures in the last 10 years.

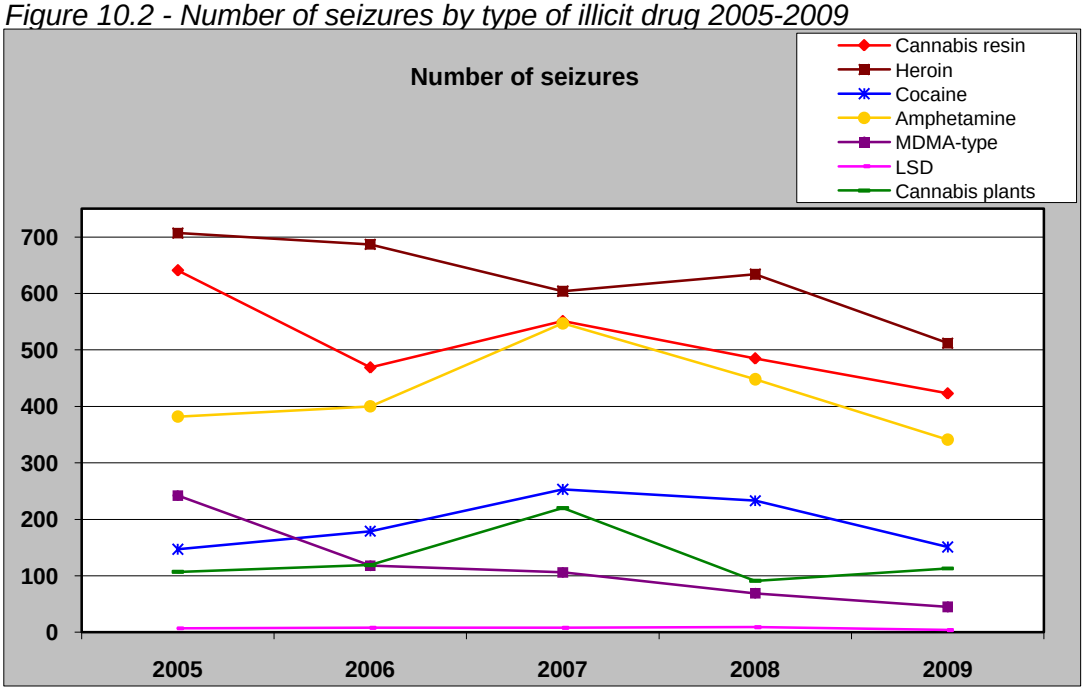
Figure 10.1 - Number of illicit drug seizures 1999-2009



Source: Ministry of the Interior

Decline in the number of drug seizures correlates with decreased number of criminal reports (Chapter 9.1) as a result of increased judicial and law enforcement orientation on suppression of organised forms of drug-related crime during the recent years. Increased quantities of seized cannabis products as the main drug of abuse, with decreasing number of such seizures in the recent years (ST 13; 2008, 2009, 2010), are mainly output of operations targeting organised drug trafficking groups instead of drug users. Overview of the number of seizures by specific drugs (Figure 10.2) shows similar trend between almost all substances.

Figure 10.2 - Number of seizures by type of illicit drug 2005-2009



* Data on herbal cannabis are not presented in the figure for technical reasons (high values).
Source: Ministry of the Interior

In the introduction of this Chapter it was described recent restructure of criminal police which has yet to yield significant results in the forthcoming years that should reflect in increased quantities of illicit drugs. However, all national and especially joint international operations targeting organised drug trafficking activities are very complex and time consuming. At the end, efforts of a country like e.g. participation in international controlled delivery, often doesn't result with additional figures in national statistics on drug seizures. Therefore, in interpreting drug markets as well as the effectiveness of law enforcement activities there has to be taken into account a vast range of different indicators.

Table 10.2 - Quantities of seized illicit drugs 2005-2009

Total seizures of all types of illicit drugs	2005	2006	2007	2008	2009
Cannabis resin (kg)	53	12	4	5	113
Herbal cannabis (kg)	983	202	239	221	255
Cannabis plant (pieces)	2 960	2 699	2 886	272	5 336
Heroin (kg)	27	82	74	153	59
Cocaine (kg)	9	6	105	29	7
Amphetamines (kg)	14	12	8	15	13
Ecstasy (tablets)	33 601	16 340	12 609	6 855	2 455
LSD (doses)	21	21	215	653	21
Methadone (tablets)	9 413	12 551	6 529	10 920	4 070

Source: Ministry of the Interior

As already mentioned, a shift in quantities of cannabis resin and herbal cannabis seizures compared to 2008 was registered, with a remark that in 2009 there was a big seizure of 96 kg 344 g of cannabis resin. However, despite occasional increases in seized quantities of herbal cannabis, in general there has been noticed declining trend since 2001. An increase in cannabis plant seizures (2009:5.336; 2007:2.886) was also noted, with the exception of the previous year[40] when there was a significant deviation caused by the destruction of the industrial hemp plantation. The purpose of hemp production at the plantation was aimed at fish feed production, but it was destroyed since the stalks yielded prohibited levels of THC. Still, the increase in seizures of this type of illicit drug compared to 2007 is significant (84.9%).

Heroin and cocaine seizures were in decline in 2009. However, during the last ten years there were significant cocaine seizures in 2000 (913 kg), 2003 (351 kg) and 2007 (105 kg) which indicates that cocaine is being trafficked through the Croatian territory and slowly it is rising in the consumers market. On the other hand, specific smuggling modus (described more detailed in Chapter 10.1) makes detection more difficult. Heroine is constantly present in Croatia during last decades due to trafficking routs that pass though our country. Quantities of seized heroin may vary form year to year, depending on the trafficking activities as well as the national and international anti-trafficking measures. In 2008, it was recorded the largest quantity of seized heroine (153 kg) in the last 10 years, so quantity seized in 2009 made a decrease of 61%.

The quantities of amphetamine seizures in the last five years ranged between 11 and 15 kg a year, except for the year 2007, when a little less than 8 kg of the mentioned drug was seized. In the past ten-year period, quantities of seized amphetamine were steadily increasing,

[40] In the last year's Report we have informed about 271 819 pieces of seized cannabis plant in 2009, similarly as it was presented at the national level, but in the ST 13 (2009) there was information on only 272 pieces which corresponds to the real situation when we exclude plants seized in the industrial hemp plantation.

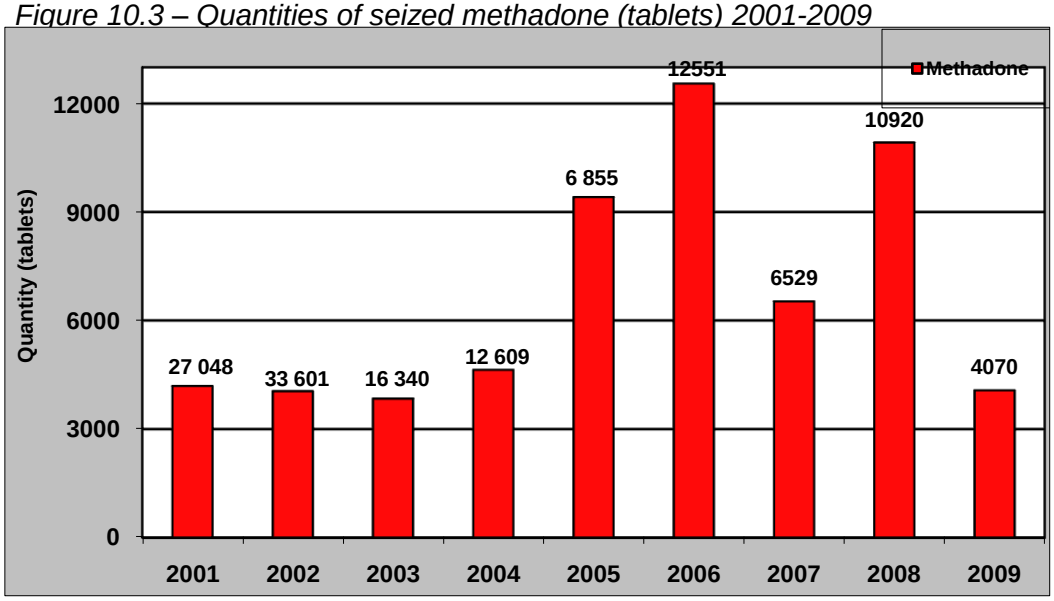
despite the fact that in 2009 there was seized 15.1% less amphetamine than in the previous year.

Contrary to the amphetamine situation, seizures of ecstasy were sharply declining during last decade. The same trend continued in 2009 when there was seized 64% less ecstasy tablets compared to the previous reporting period.

The quantity of LSD seizures in 2009 was on the same level as in 2005 and 2006. Larger quantities of LSD were seized during 2007 and 2008.

According to the data of the Ministry of the Interior, black methadone market still exists (Figure 10.3). However, the year 2009 recoded the lowest quantity of methadone seized in the period since 2005 (4 070 tablets, which is by 62% less than in 2008). Such situation may be related to novelties in the treatment of drug addicts and introduction of other medicaments used in the substitution therapy (please see Chapter 7.1).

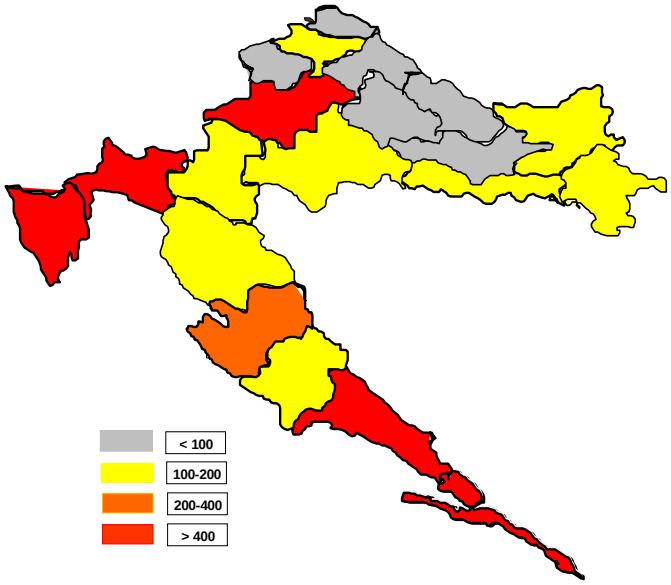
Figure 10.3 – Quantities of seized methadone (tablets) 2001-2009



Source: Ministry of the Interior

As regards territorial distribution of illicit drug seizures, data of Police Districts across country show that the highest number of seizures was recorded in the counties with larger urban areas which have the highest rate of treated drug addicts. With the exception of the capital (City of Zagreb) and Zagreb County, coastal counties take the largest share of all seizures in the country, which is similar to previous years. Higher availability of illicit substances in those counties can be partly explained with previously mentioned tourist and maritime orientation of our country but also with the higher demand for illicit substances. If compared to 2008, majority of counties reported lower number of illicit drug seizures in 2007 which again can be explained with greater focus on suppressing drug smuggling, rather than on street dealing and possession which makes more than 60% of all reports for narcotic drug abuse offence and has a declining trend over the past few years. However, number of illicit drug seizures increased in some counties along the main trafficking routes and in the coast (e.g. Zadar County that has the second highest rates of treated drug addicts in the country), indicating possibly higher availability of illicit drugs. As some of those counties (e.g. Lika-Senj County) have very low rate of treated drug addicts, increased illicit drug availability can lead to more drug addiction treatment demands in the future unless appropriate supply and demand reduction activities are continued in systematic and efficient manner.

Picture 10.2 – Number of illicit drug seizures by Police Departments in 2009



Source: Ministry of the Interior

Pursuant to the Act on Combating Narcotic Drugs Abuse, seized drugs are destroyed in the presence of the Committee for the Destruction of Seized Drugs. More information can be found in Chapter 1.1.

There were no seizures of precursors in 2009, although Croatian law enforcement forces participated in several international operation aims at disclosing organised criminal groups. So far that haven't been detected any illicit laboratories, and judging from the surveillance of precursors that could be used for illicit drug production, it is believed that Croatia is not a country with the potential to become a drug manufacturer.

10.3 Price/purity

Price

Main information source of drug prices on the illicit drug market in Croatia are the data collected by police officers during criminal investigations and special measures (purchase simulation) connected with illicit drug supply suppression. Data on prices of illicit drugs at retail/street sale were in 2009 obtained by means of statistical monitoring of drug-related crime at the national level and seizures. For the purpose of Standard Table 16 – Prices at street level of some illicit substances, data from 20 Police Departments were collected, covering the whole territory of the Republic of Croatia. However, there is still no systematic monitoring or prices at street level, although some initiatives were undertaken in 2010 in order to improve monitoring which are going to be described in the next Report.

The price of illicit drugs in street sale is variable and depends on the availability, origin and quality of illicit drugs. In the Table 10.3 we are referring to minimum, maximum and average "retail" prices for a gram, tablet or dose. Thus, the prices are following: 5-8 EUR for a gram of herbal cannabis, 25-40 EUR for a gram of heroin, 40-70 EUR for a gram of cocaine, 15-25 EUR for amphetamine, 5-7 EUR for a tablet of ecstasy, and 15-18 EUR for a dose of LSD (ST 16, 2010).

Table 10.3 - Prices of illicit drugs, street value in Euros (2004, 2006, 2008, 2009)

Year	2004			2006			2008			2009			
Drug	Min	Max	Average	Min	Max	Average	Min	Max	Average	Min	Max	Average	
Heroin (g)	30	50	40	25	40	30	25	40	30	25	40	30	=
Cannabis resin (g)	4	6	5	5	7	6	6	8	7	10	15	**13**	↑
Herbal cannabis (g)	2	5	3	1.5	4	3	3	6	5	5	8	**7**	↑
Cocaine (g)	55	80	70	55	70	60	50	70	60	40	70	**50**	↓
Amphetamine (g)	15	30	20	10	25	15	10	25	15	15	25	**20**	↑
Ecstasy (tab.)	3	7	5	4	7	5.5	3	7	5	5	7	5	=
LSD (doses)	15	18	16.5	15	18	16	15	18	16	15	18	16	=

Source: Ministry of the Interior

If we compare drug prices on the Croatian illicit drug market during the last 6 years (Table 10.3), it can be noticed that price of cocaine was further decreased in 2009, the most probably due to increased supply of cocaine on the drug market, which can not be confirmed by seized quantities of that substance in 2009 that were lower than in previous year. However, more significant cocaine seizures were realised in 2007 and first half of this decade which could indicate higher presence of cocaine in Croatia. It also has to be noted that major part of cocaine shipments is never revealed due to numerous "inventive" smuggling methods of traffickers and the fact that it is often smuggled in the ship cargo for which, besides the risk assessment, there are required time consuming and expensive searches. There has been noticed higher number of individual cases where smaller quantities of cocaine are smuggled directly from South America, which influences decrease in price. Significantly lower purity of cocaine in 2009 (22.7% compared to 37% in 2006) have also influenced decrease in price (ST 14, 2010). Epidemiological data are indicating that heroin addiction is gradually being replaced by cocaine and amphetamine related problems. Although the number of cocaine addicts that were demanding treatment during the last 3 years is stabile, the fact that it is predominantly used in the age between 20-29 years and easier availability due to lower price may indicate that jet in the future we can expect more referrals to treatment (TDI 1 and TDI 2, 2010). The age of amphetamine users is similar to cocaine users with the exception that they also have significant proportion of 15-19 years old users. In addition, number of persons treated for amphetamine use was increased in 2009 and seizures of that substance are steadily growing during last 10 years (despite 15% decrease in 2009 compared to 2008). With this obviously increased availability it is difficult to explain increased street price of amphetamine, especially if taken into account that the purity of amphetamine was in 2009 the lowest in the period of last 4 years. The most probably higher quality of cannabis products and their shortage on the illicit drug market (according to the general decreasing trend in number of seizures during last decade in case of herbal cannabis) induced continued increase in their street price during last few years, which quite significantly jumped up in 2009 in the case of cannabis resin. Significant seizures of herbal cannabis at the border crossings also influenced the price. According to the intelligence information, the price for smuggling herbal cannabis across the state border was increased by 30% in 2009. It is interesting that last year there was seized 500 times more cannabis resin than in 2008, which was destined for the Western European market. Other prices are stable and they vary depending on the drug purity, availability, place of illegal sale and the consumer groups they are being offered to.

Purity

According to the Ministry of the Interior's acts in effect, all temporarily seized drugs must be delivered to the Forensic Science Centre "Ivan Vučetić" [41] which provides a qualitative expert evaluation in case of every illicit drug and psychoactive substance seized in the Republic of Croatia. Their qualitative expert evaluation, that is determining the purity or the share of a certain drug in a mixture, is conducted for the operative purposes of the Police in all the cases when a sufficient quantity of a drug or a psychoactive substance is delivered. Since 2001, The Department for Toxicological Expert Evaluation is a member of the *European Network of Forensic Science Institutes (ENFSI) Working Group on Drugs. Every year the Department takes two Proficiency tests (ENFSI and UNODC). The Forensic Science Centre has requested the ISO 17025 accreditation, while the Department has validated and applied two of its methods for the accreditation: the Quantitative determination of amphetamine presence by the GCMS method and the Quantitative determination of amphetamine presence by the HPLC method.*

The Forensic Science Centre carries out routine quantitative expert evaluations of heroin, cocaine, amphetamine, methamphetamine and MDMA in all submitted samples sufficiently large for analysis – while there are insufficient resources for quantitative expert evaluations of tetrahydrocannabinol in marijuana and its products.

Heroin mixtures seized in 2009 were in most cases adulterated with analgoantipyretic paracetamol and psychostimulant caffeine, and in 7.8% of heroin samples traces of anxiolitic diazepam and antiepileptic phenobarbital or less frequently different sugars like lactose and sucrose, and traces of narcoalagetics methadone and cocaine. Quantitative expert evaluations included 456 cases with 1 223 samples, in which the minimal portion of heroin was 0.4%, the maximal portion was 62%, while the average portion of the heroin base was 21.5%. Out of the aforementioned number of heroin cases, 250 cases with a total of 352 samples involved quantities of less than one gram (commonly called a "street dose"). The minimal portion of heroin in those cases was 0.4%, the maximal portion was 57%, and the average portion was 21.8%.

Cocaine mixtures seized in 2009 were in most cases adulterated with analgoantipyretic phenacetine, local anaesthetic and antiarrhytmic lidocaine, aminoacid creatine, sugar alcohol mannitol, and lactose. The samples of cocaine very often contained antihelmintic levamisole, and in some cases amphetamine, procaine, Ca channel blocker diltiazem, antihistaminic hidroxyzin and decongestant and sympathomimetic ephedrine. Quantitative expert evaluations included 194 cases with 436 samples, in which the minimal portion of cocaine was 0.7%, the maximal portion was 82%, while the average portion was 22.7%. Out of the aforementioned number of cocaine cases, 88 cases with a total of 122 samples involved quantities of less than one gram (commonly called a "street dose"). The minimal portion of cocaine in those cases was 0.7%, the maximal portion was 77%, and the average portion was 20.8%.

Amphetamine seized in 2009 was in powder form and, less frequently, in tablet form. In most cases it was adulterated with creatine, caffeine, lactose, less often with starch. The presence of para-fluoramphetamine was often detected in samples (in 4.7% of amphetamine samples), while in some cases it contained traces of MDMA, methamphetamine, clorphenilpiperazine and cocaine. Quantitative expert evaluations of amphetamine in tablet form included a total of 117 tablets from 6 cases, in which the minimal portion of amphetamine was less than 1%, the maximal portion was 7.2% and the average portion was 3.2%. Quantitative expert evaluations of amphetamine in powder form included a total of 589

[41] The Forensic Science Centre "Ivan Vučetić" operates within the Ministry of the Interior.

samples from 292 cases, in which the minimal portion of amphetamine was less than 1%, the maximal portion was 40.7%, while the average portion was 5.2%. Out of the aforementioned number of amphetamine powder cases, a total of 138 samples from 125 cases involved quantities of less than one gram (commonly called a "street dose"). The minimal portion of amphetamine in those cases was less than 1%, the maximal portion was 40.7%, and the average portion was 6%.

MDMA (commonly called "ecstasy") seized in 2009 was mostly in tablet form or in fewer cases, in the form of powder or powder in capsules. Tablets and powders contained lactose and sorbitol as a filler, with some traces of MDA and MDE. Quantitative expert evaluations of MDMA in tablet form included 14 cases with a total of 633 tablets in which the minimal portion of MDMA base was 0.6%, the maximal portion was 33.7%, while the average portion of the MDMA base was 20.9%. Out of the total number of 663 tablets, 577 tablets contained the mixture of MDMA (2.4% of MDMA base) and amphetamine (2.9% amphetamine base) with traces of clorphrnilpiperazine (mCPP). Out of the aforementioned number of MDMA in tablet form cases, 9 cases with a total of 16 tablets involved quantities of less than one gram (commonly called a "street dose"). The minimal portion of MDMA base in those cases was 0.6%, the maximal portion was 33.7%, and the average portion was 23.3%.

Quantitative expert evaluations of MDMA in powder form included a total of 11 cases with 11 samples, in which the minimal portion of MDMA base was 2%, the maximal portion was 74.6%, while the average portion was 31.2%. Out of the aforementioned number of MDMA powder cases, 6 cases with a total of 6 samples involved quantities of less than one gram (commonly called a "street dose"). The minimal portion of MDMA base in those cases was 16.8%, the maximal portion was 73.7%, and the average portion was 47.7%. There was one case of methamphetamine powder seizure in 2009, with two samples in powder form, in which a total of 0.46 g of methamphetamine were seized and in which the portion of metamphetamine base was 76%. In 2009 mCPP (clorphenilpiperazine) in tablet form was seized in 25 cases with a total number of 1512 tablets. Except mCPP which was the only active ingredient in 44% of cases, tablets contained traces of MDMA and amphematine in 20% of cases (769 tablets), traces of amphematine and para-fluoroamphetamine in 8% of cases (504 tablets) and traces of metoclopramide in 8% of cases (100 tablets). In some cases tablets contained 2C-B (4-brom-2.5-dimetoxiphenetilamine), amphetamine, piperonal, benzylpiperazine (BZP) and trifluormethylphenylpiperazin.

In addition, methylone (bk-MDMA, MDMC, 3.4-methylene dioxophenyl-2-(methylamino) propane-1-one) in tablet form was found in one case, while butylone (bk-MBDB, 2-methylamino-1-(3.4-methylene dioxophenyl)-butan-1-one) in tablet and powder form in two cases. Piperonal (a precursor for the synthesis of MDMA and MDA) in tablet form was seized in one case with 127 tablets. In 2009 Forensic Scientific Centre also carried out expert evaluation in 27 cases with anabolic steroids with 1 988 samples, mostly tablets. The most common steriod is methandrostenolone (methadienone) while stanozolol, nandrolone, oxymetholon and boldenone are less frequent.

Table 10.4 – Purity and prize of seized illicit drugs in the Republic of Croatia (2009)

DRUG	Heroin	Cocaine	Amphetamine	MDMA	Methamphetamine
PURITY					
MIN %	0.4	0.7	<1	3.4	
MAX %	62	82	40.7	96	
MEAN %	21.5 ↓	22.7 ↓	5.2 ↓	55 ↓	76*
PRICE (EUR)					
MIN %	25	40	15	5	-**
MAX %	40	70	25	7	-
MEAN %	30 =	50 ↓	20 ↑	5 =	-

* There was seized in only one case with 2 samples in the form of powder and therefore minimum and maximum purity can not be shown.
** Prices for methamphetamine are not available.

Source: Ministry of the Interior

According to the ST 14 (2010), purity of analysed seized drugs in Croatia was to the certain extent lower in 2009 compared to previous years. Cocaine saw the largest decrease in quality and only its case purity correlates with the trend in price. Lower percentage of pure substance in the samples of brown heroine and MDMA didn't influence their price at the street level (ST 16, 2010). This year methamphetamine can not be analysed due to only one seizure of that substance in 2009. Information on price for that type of drug was also not available. To get more complete picture, it would be interesting to see how percentage of THC in cannabis products correlates with their price but unfortunately the Forensic Science Centre doesn't have sufficient funds to analyse cannabis products. Despite the efforts to interconnect data on price and purity, it has to be stressed that for such analysis various other elements has to be taken into account as it was attempted in the text related to prices.

In relation to the ST 15, in 2009 there was analysed composition of 2 272 tablets where 29.2% of them contained MDMA-like substances, 12.5% (meth)amphetamines, 2.08% MDMA-like substances and (meth)amphetamines, in 2.08% there were other substances and in 54.2% miscellaneous.

PART B

11 History, methods and implementation of national treatment guidelines

In Croatia there are two guidelines that refer to the treatment of drug addiction: the Guidelines for the Methadone Pharmacotherapy of Opiate Dependence and the Guidelines for the Buprenorphine Pharmacotherapy of Opiate Dependence. Both were adopted in 2006 and are targeting opiate addicts as the most significant and problematic group of drug users in Croatia. The main idea behind elaborating these guidelines was to provide professionals in the responsible inpatient and outpatient treatment settings with operational framework that would increase effectiveness of substitution treatment and would prevent possible abuse of medicines concerned. Both guidelines were elaborated by the expert group at the Ministry of Health and Social Welfare.

11.1 History and overall framework

The first comprehensive document that provided a base for establishing systematic and organised treatment of drug addiction in Croatia, in line with the highest professional and quality standards was the National Strategy for Combating Narcotic Drugs Abuse in the Republic of Croatia, which was adopted by the Croatian Parliament in 1996, as the first strategic document in the field. Due to the geostrategic position of Croatia on so-called Balkan route which was especially in the past well known for trafficking in opiates, maritime orientation of the country, circumstances related to the Croatian War of Independence as well as other social factors, problems related to abuse of opiates started to expand in early 1990. That is the main reason why treatment of drug addiction in Croatia is primarily focused on opiate drug addicts as they still today dominate in the total number of drug addicts (2009:80.8%) registered by the treatment system.

Basic determinants of the state policies regarding treatment of drug addicts require the availability of different types of programmes. The therapeutic approaches, as well as forms of intervention and aid, must be adjusted individually so that three determinants of a good state policy regarding addict treatment are abided by, fulfilling at the same time the most important strategic and individual goals (according to the EU strategy on drugs and valid national strategic documents):

- Detection of heroin addict in an early stage of the disease and their contact with the treatment system, so that a therapy may commence;
- Enabling and implementing a treatment in the largest number of patients possible with regard to the total number of heroin addicts in the community;
- Ensuring that the largest number of patients maintain their therapy.

None of the three determinants is possible to accomplish if heroin addicts are not enabled an easily available supply of opiate agonists.

Therefore, the first national guidelines related to the treatment of drug addiction referred to methadone substitution treatment of opiate addiction. The *Guidelines for the Methadone Pharmacotherapy of Opiate Dependence* (Methadone Guidelines) were adopted in January 2006 by the Croatian Government, upon the recommendation of the Ministry of Health and Social Welfare. The basic starting point for the creation of this document was the National Strategy for Combating Narcotic Drugs Abuse in the Republic of Croatia (adopted by the Croatian Parliament in 1996). The Methadone Guidelines elaborates position and role of the national system for addiction treatment, the organization of the system, as well as the treatment of heroin addicts itself. In the creation of the Guidelines, the following documents were used: WHO (The Practices of Pharmacotherapy of Opioid Dependence, WHO 2004),

EMCDDA (Reviewing current practice in drug-substitution treatment in the European Union, EMCDDA, 2000); Methadone Guidelines, prepared by A. Verster and E. Buning in the scope of the project funded by the European Commission (EuroMeth, June, 2000), NIDA (Thirteen principles of effective drug addiction treatment, NIDA Notes; Vol.14.Nr.5. 1999), European Union Drugs Strategy 2005 – 2012 (Council of the EU 15074/04, Cordrogue 77), document "Improvement possibilities of the heroin addict treatment programme using methadone" (Sakoman, 2000). All these sources confirmed the contemporary scientific findings, and define treatment of addicts as a long-term (even lifelong) process, with an unpredictable dynamics and final result, which is, like all other chronic diseases, a task undertaken by medical experts.

Recognizing the importance and benefits of guidelines in the treatment of drug addicts and in order to introduce new treatment possibilities as well as to ensure its consistent implementation, the Government Committee on Combating Drugs Abuse adopted the *Guidelines for the Buprenorphine Pharmacotherapy of Opiate Dependence* (Buprenorphine Guidelines) already in December 2006. Buprenorphine is as well as methadone included in the positive lists to medicines that are covered by the Croatian health insurance. Different than in the case of the Methadone Guidelines, starting point for elaboration of this document was the National Strategy for Combating Narcotic Drugs Abuse for 2006-2012 (adopted by the Croatian Parliament on 2 December 2005) and the Action Plan on Combating Narcotic Drugs Abuse for 2006-2009 (adopted by the Croatian Government on 15 February 2006) as new strategic documents in the field. Similar like Methadone Guidelines, this document also describes position and role of the national system for addiction treatment, the organisation of the system, and the treatment of heroin addicts. In the creation of the Guidelines, the following documents were consulted: WHO (*The Practices of Pharmacotherapy of Opioid Dependence*, WHO 2004), EMCDDA (*Reviewing current practice in drug-substitution treatment in the European Union*, EMCDDA, 2000), NIDA (*Thirteen principles of effective drug addiction treatment*, NIDA Notes; Vol.14, Nr.5, 1999), European Union Drugs Strategy 2005 – 2012 (Council of the EU 15074/04, Cordrogue 77). The document stresses: "opiate agonist pharmacotherapy is the backbone of the modern approach to addiction treatment. Compared to methadone, buprenorphine has been confirmed to be a safer option, since its mechanism of action places it in the category of partial opiate agonists of mi receptors in the brain, and, unlike methadone, kappa and delta receptor antagonists. By acting on mi receptors, it efficiently reduces the craving for opiates and prevents abstinence symptoms" (Guidelines for the Buprenorphine Pharmacotherapy of Opiate Dependence 2006, p. 1).

11.2 Existing guidelines: narrative description of existing guidelines

The main objective of the Methadone Guidelines is to reduce the harmful consequences of opiate addiction on the society and to help addicts and their families by early treatment of addicts and in large numbers; reducing number of new addicts attracted by untreated addicts; preventing spread of hepatitis B and C, HIV, syphillis, tuberculosis and other infections; reducing costs of chronic disease treatment (AIDS, hepatitis B and C, tuberculosis and many others); reducing total mortality of addicts and overdose mortality; maintaining work productivity (of the addicts' parents, as well as of the addicts themselves); reducing effect of addiction on life expectancy and lost years of healthy (productive and quality) life; reducing consumption and demand for illicit substances and drugs; reducing health protection of addicted pregnant women and their children; increasing probability of full recovery and satisfactory social rehabilitation and reintegration; improving treatment of comorbid psychological disorders in opiate addicts; reducing number of secondary criminal offences; reducing profit of organised crime groups; reducing prostitution; reducing corruption and reducing number of traffic accidents and the severity of material damage.

The indication for methadone treatment is a confirmed opiate addiction after a diagnostic procedure, based on the criteria for this disease according to ICD-10 or DSM-IV, with a special emphasis placed on psychological criteria (strong craving or compulsion to take opiates; difficulty in controlling behaviour that can lead to discontinued or reduced use), physiological criteria (characteristic withdrawal symptom upon discontinuing use of the opiate; proof of tolerance, and the subsequent need to increase the dose to achieve the desired effects) and social criteria (progressive neglect of other interests/sources of pleasure, increasingly more time spent in acquiring and consuming of or recovering from the drug; persistent taking of the drug despite the harmful side effects).

The contemporary concept of addict treatment should enable the patient to be in the position of a subject in the therapeutic process. Therefore, both the assessment of a physician according to the best practice for each addict and the co-decision of the addicts themselves are important in the decision on methadone therapy. Among the available treatment modalities there are short detoxification, slow detoxification, short (temporary) maintenance therapy and long-term maintenance therapy.

To, according to the principle of the best practice and these guidelines, indicate a methadone therapy in the treatment of heroin addicts, a physician must have the necessary theoretical and practical knowledge examined in the manner set out by the law, which makes him/her an authorised physician for such a specific form of treatment. Education is implemented according to a special programme, which must include specific knowledge on opiate agonist pharmacotherapy. The Drug Reference Centre of the Ministry of Health and Social Welfare is competent for the creation and implementation of the programme, as well as for examinations. The minister of health, according to the needs in each individual county, on the initiative of the Croatian Institute of Public Health, promulgates the list of authorised physicians. The updated list of authorised physicians is delivered to public health institutes, general practitioners and pharmacies. Physicians and their expert teams oblige the patient to, according to their individual therapy agreement, undergo the recommended therapy, which must include regular visit to his/her chosen general practitioner, who will, according to the written recommendation of the authorised physician, indirectly enable the addicted patient to use methadone and must undergo control examinations by the authorised physician on the set date. In addition, other psychosocial measures have to be provided as well (psychotherapy, social interventions etc.). To start with a methadone treatment programme, the addict must first contact a team of authorised physicians. After a diagnostic procedure and indication of methadone therapy, the authorised physician writes a finding for the general practitioner, which must contain the following elements: date of the finding; name and surname of the physician to which the therapy recommendation is sent; type of preparation (tablet or solution) and the dose of the drug; whether the drug is administered under supervision, or by the patient, or by family members; duration of the therapy and dates of control examinations). The client may request and, with or against the physician's recommendation, discontinue the programme permanently or temporarily. The programme may be discontinued temporarily or for a longer period of time by the decision of an authorised specialist. The physician, responsible for the indirect administration of methadone, according to the regulations on dispensing “narcotics”, writes a prescription and ensures the dispensing of the drug, and afterwards the keeping of the necessary quantity of the drug. The addict must not receive methadone in a pharmacy by him/herself. The physician can authorise a person who will do that instead of the addict. That can be a reliable member of the addict's family. In such a case, the prescription should contain the name and surname of the authorised person with the ID number. The patient must take the drug in the clinic, under the supervision of the medical staff. Methadone may be administered to the patient directly and on a one-time basis by all physicians as a form of emergency intervention in case of an acute abstinence syndrome. The Ministry of Health, according to a special plan, supervises the process of indicating, prescribing and dispensing methadone. The expert supervision of the addict treatment programme that includes specific opiate agonist

pharmacotherapy will be implemented by the expert team of the Drugs Reference Centre and Croatian Institute for Public Health. Until the Reference Centre is established, the expert supervision will be implemented by the Croatian Institute for Public Health in cooperation with appointed experts and the Ministry of Health.

Buprenorphine was introduced in the treatment of opiate addicts in Croatia with the objective to expand treatment possibilities. Although it has not yet been scientifically confirmed which addicts will benefit the most from a methadone therapy, and which from buprenorphine therapy, the Buprenorphine Guidelines emphasise that there are several proven facts which make the drug essential in therapy today, with a comparative advantage over methadone: high-dose tolerance for buprenorphine is better than high-dose tolerance of methadone; patients develop tolerance to buprenorphine in much fewer cases; buprenorphine is much less addictive than methadone; buprenorphine use bears an extremely small risk of overdose death; many addicts who are undergoing methadone addiction therapy today could benefit from Buprenorphine; buprenorphine may be administered three times a week; patients may visit their physician only once a week. It has to be stressed that Buprenorphine Guidelines contains similar provisions in more general issues like objective of the therapy, indications, treatment modalities, physicians authorised for substitution treatment etc, which are adapted to the specificities of buprenorphine therapy.

11.3 Implementation process

When talking about who directly initiates and implements the procedure, there should be differentiated inpatient and outpatient settings. In hospitals that would be specialist psychiatrists, as a part of the detoxification process in specialist hospital wards; specialist psychiatrists and other physicians as consulting physicians in other hospital wards where patients are treated for other diseases, or where there are pregnant women and infants; specialist psychiatrists and other authorised physicians in prison hospitals (including prisons, detentions, penitentiaries and penal institutions). In outpatient treatment there is authorised psychiatrists and other authorised physicians employed in the addiction prevention services of public health institutes and their branches (prevention and outpatient treatment on the municipal level); authorised psychiatrists who are a part of polyclinical, specialist and consulting health care in hospitals; authorised psychiatrists and other authorised physicians with a private practice.

To start with a substitution treatment programme, the addict must first visit an authorised physician. There are several modes of involving patients in the programme and keeping them in it.

- Visiting an outpatient treatment service, also possible directly (without a referral and fees). The patient must be indentified, and then he/she completes a compulsory questionnaire (for the purposes of registry, epidemiological monitoring, national registry and statistics). If after a diagnostic procedure buprenorphine is indicated, the addict may start the therapy, according to the written recommendation (letter to the physician), at his/her chosen general practitioner, and only exceptionally at some other institution, in a prescribed manner.
- Visiting the clinic of an authorised physician, who is at the same time the chosen general practitioner. This mode enables the addict to be examined, to get a prescription for the drug and to start a buprenorphine therapy, all in one place. If the physician deems the patient's case to be too complicated, he/she will ask for another opinion and request that the initial administration of buprenorphine be started at the local Centre, and continue in his practice. The physician is obliged to complete a compulsory questionnaire for the records and send it to the Croatian Institute for Public Health.

- Visiting the private psychiatric practice of an authorised physician (psychiatrist). After an examination and decision on whether to start the therapy, the psychiatrist first completes the compulsory questionnaire for the records, writes the medical findings and prescription for the first package of the drug, and then induces the addict to the programme (all the costs are borne by the patient). After the first week, when the patient has stabilised on an appropriate dose, the treatment may continue in at the practice using the procedure according to the decision of the authorised physician, or the patient may be referred to his/her chosen general practitioner with his/her medical documents to resume the recommended treatment directly.
- Being referred by the chosen general practitioner to the clinic of an authorised psychiatrist of a polyclinical institution. After an examination and decision on whether to start the therapy, the psychiatrist first completes the compulsory questionnaire and writes the medical findings on the planned procedure. The initial administration of buprenorphine, lasting from a day to a week, depending on a clinical decision and the severity of the case, will be implemented in the polyclinic, at the local Centre, or (in simpler cases) in the clinic of the chosen physician. After a successful initial administration, further treatment will be implemented by the chosen general practitioner in cooperation with the authorised physician.

11.4 For countries that have treatment guidelines: comparison with the WHO guidelines

In addition to the information provided in the questionnaire on coherence with WHO guidelines (see Table 11.1), in the text bellow there is more detailed description of key issues.

When it comes to types of programmes and criteria for administering methadone / buprenorphine, according to the national guidelines concerned the contemporary concept of addict treatment should enable the patient to be in the position of a subject in the therapeutic process. Therefore, both the assessment of a physician according to the best practice for each addict and the co-decision of the addicts themselves are important in the decision on methadone therapy. Short detoxification is a procedure which eases the abstinence syndrome in patients following discontinued use of heroin (other opiate agonists) by gradually reducing the daily methadone doses over the period of a month. It is indicated in therapy when a complete abstinence, followed by abstinence maintenance, is agreed upon as the goal of the therapy. Slow detoxification is a procedure which eases the discontinued use of opiates in patients by gradually reducing the daily methadone doses over the period up to six or more months. It is indicated if previous attempt or attempts at a rapid detoxification failed. The procedure is recommended when a complete abstinence from opiate agonists and abstinence maintenance are agreed upon as the goal of the therapy, and when it is assessed that a rapid detoxification process is not possible due to the severity of the addiction. Short (temporary) maintenance therapy on a sustained daily methadone dose includes a procedure in which the daily dose of methadone given to the patient remains the same for up to six months. It is indicated as the initial treatment of addicts who may lack the cannot (personal capacity and support of the environment) quit drugs completely, or where an attempt at a detoxification may result either in discontinued treatment or continued heroin use; in patients who are unable to establish and maintain abstinence after a previous detoxification attempt; in patients who, after detoxification and maintaining heroin abstinence, indicate a progressive craving for the drug, and thus compensate for the heroin abstinence by abusing large quantities of psychoactive drugs, illicitly obtained methadone and other types of drugs and/or alcohol; as a temporary form of treatment which guarantees the continuation of the programme and facilitates an improvement of the patient's social status and living conditions, after which another detoxification process may be attempted; in addicts

who, during detoxification, insist that the daily methadone doses is maintained because they feel unwell or fear recidivism. Long-term maintenance therapy is a process which enables the addict to take appropriate (with regard to tolerance) daily doses of methadone over the period of more than six months. Some of the patients undergo such maintenance treatment for the remainder of their life. It is indicated when the clinical features of the addiction are so severe that this form of treatment is thought to be the best for both the addict and his/her environment (family, social community); in addicts who could not be motivated to quit drugs and adopt a "drug-free" therapy goal; in pregnant women addicted to opiates; in HIV patients addicted to drugs; in addicts with a comorbidity.

The daily dose must be sufficient to maintain the stability of the patient and prevent withdrawal syptoms (abstinence syndrome) for 24 hours, meaning it has to be adjusted to the individual needs of each addict. The daily dose[42] of methadone between 10 and 120 mg is enough for the majority of addicts. In special circumstances, when a dose greater than 120 mg is required, the decision is made and the medical finding signed by two authorised physicians. The recommended initial dose should not exceed 30 mg. The daily dose of buprenorphine between 1 and 8 mg is enough for the majority of addicts. The initial dose with which the induction of buprenorphine begins is usually 2 mg, and is taken (sublingually) under direct supervision. The patient is then placed under observation for 1-2 hours (necessary to observe the initial action of the drug and to intervene in case of an abstinence syndrome (due to the antagonistic action of buprenorphine on "pure" opiate agonists like heroin and methadone)). Initially, during the titration of the dose, the authorised physician must examine the patient more frequently. The Methadone Guidelines say that the first examination should be carried out after 3 to 4 days, when the maximum concentration of methadone in blood is achieved due to accumulation with equal doses. The second examination should follow after a week, and then according to the patient's condition. According to the Buprenorphine Guidelines, the first examination should be carried out on the first day, and in any case after 3 to 4 days. In the first two weeks the patient should be examined at least three times, and i that time the maximum concentration of buprenorphine in blood will be reached with equal doses. This will also establish a cooperation with the patient and help determine the optimal dose.

When the addict stabilises his/her therapy routine and shows improvement in abstinence, cooperation and positive changes to his/her behaviour, the manner of administering methadone may be altered in the sense that the addict comes and takes the drug under direct supervision three times a week, and later once a week. Before travelling outside the place of residence or abroad, pursuant to the Act on Combating Drugs Abuse, the drug may be given to the patient with the accompanying medical documentation in advance for the period prescribed by an authorised physician (15 days at most). In special circumstances, a physician may make the drug available in advance for a longer period of time, especially if there is a very reliable cooperation with a family member.

Physicians and their expert teams oblige the patient to, according to their individual therapy agreement, undergo the recommended therapy, which must include at least the first two or more following elements: to visit regularly his/her chosen general practitioner, who will, according to the written recommendation of the authorised physician, indirectly enable the addicted patient to use methadone; to undergo control examinations by the authorised physician on the set date; to undergo a sporadic abstinence control: analysis of urine, saliva, hair sample at the premises or in a biochemical laboratory, conducted with the addict's consent; psychotherapy; family procedure; education on the disease and the possibilities of recidivism prevention; measured of preventing infections (HIV, hepatitis, syphilis), including testing on the premises or referrals for testing in a competent health institution; social

[42] Croatian guidelines do not specify an average maintenance dose but rather provide a range of recommended dose.

interventions; special re-educational procedure, if needed; comorbidity therapy; self-help programmes (former addict clubs or NGO programmes).

Table 11.1 – Comparison of national treatment guidelines with respective WHO guidelines

	Name of Assessors: Office for Combating Drugs Abuse of the Government of the Republic of Croatia	Yes	No	Not Applicable specify	No answer
1	**Choice of treatment**				
1.2	For the pharmacological treatment of opioid dependence, clinicians should offer opioid withdrawal, opioid agonist maintenance and opioid antagonist (naltrexone) treatment, but most patients should be advised to use opioid agonist maintenance treatment. Do the present guidelines include this recommendation?	x	□	□	□
1.3	For opioid-dependent patients not commencing opioid agonist maintenance treatment, consider antagonist pharmacotherapy using naltrexone following the completion of opioid withdrawal. Do the present guidelines include this recommendation?	□	x	□	□
2	**Opioid agonist maintenance treatment**				
2.1	For opioid agonist maintenance treatment, most patients should be advised to use methadone in adequate doses in preference to buprenorphine. Do the present guidelines include this recommendation?	x	□	□	□
2.2	During methadone induction, the initial daily dose should depend on the level of neuroadaptation; it should generally not be more than 20 mg, and certainly not more than 30mg. Do the present guidelines include this recommendation?	x	□	□	□
2.3	On average, methadone maintenance doses should be in the range of 60–120 mg per day. Do the present guidelines include this recommendation	x	□	□	□
2.4	Average buprenorphine maintenance doses should be at least 8 mg per day. Do the present guidelines include this recommendation?	x		□	□
2.5	Methadone and buprenorphine doses should be directly supervised in the early phase of treatment. Do the present guidelines include this recommendation?	x	□	□	□
2.6	Take-away doses may be provided for patients when the benefits of reduced frequency of attendance are considered to outweigh the risk of diversion, subject to regular review. Do the present guidelines include this recommendation?	x	□	□	□
2.7	Psychosocial support should be offered routinely in association with pharmacological treatment for opioid dependence. Do the present guidelines include this recommendation?	x	□	□	□
3	**Management of opioid withdrawal**				
3.1	For the management of opioid withdrawal, tapered doses of opioid agonists should generally be used, although alpha-2 adrenergic agonists may also be used. Do the present guidelines include this recommendation?	□	x	□	□
3.2	Clinicians should not routinely use the combination of opioid antagonists and minimal sedation in the management of opioid withdrawal. Do the present guidelines include this recommendation?	x	□	□	□
3.3	Clinicians should not use the combination of opioid antagonists with heavy sedation in the management of opioid withdrawal. Do the present guidelines include this recommendation?	x	□	□	□
3.4	Psychosocial services should be routinely offered in combination with pharmacological treatment of opioid withdrawal.	x	□	□	□

	Do the present guidelines include this recommendation?				
4	**Pregnancy**				
4.1	Opioid agonist maintenance treatment should be used for the treatment of opioid dependence in pregnancy. Do the present guidelines include this recommendation?	x	□	□	□
4.2	Methadone maintenance should be used in pregnancy in preference to buprenorphine maintenance for the treatment of opioid dependence; although there is less evidence about the safety of buprenorphine, it might also be offered. Do the present guidelines include this recommendation?	□	x	□	□

Source: EMCDDA

12 Zagreb cohort study

12.1 Study design

The Zagreb cohort study was classified as the retrospective-dynamic one on the temporal relationship between the initiation of the study and the occurrence of the event. The cohort was dynamic since members could enter the study at different points in time which corresponded to the moment of their entry into treatment system. Similarly, individuals could exit from person-time of observation by dying or were lost to follow-up.

In preparing Zagreb cohort mortality study the data analyzed was for treated opiate drug abusers with the residence in the City of Zagreb, during the seven year period, between the January 1st 2000 and the December 31st 2006. Follow up period was extended for one year, up to 1st January 2008, in which the vital status of cohort participants was checked.

The study included all subjects who fulfilled the criteria of inclusion in the cohort which were: all male and female opiate users (i.v. or other routes of administration) living in the City of Zagreb, 15-49 years old who were treated in the health system (out- or in-patient) during any point of the study period. It was reasonable to take that age range (15-49 years old) because 98% of all opiate users in Croatia belong to it. The entrance date was the beginning of the study, or any later date during the study period and the date of exit from the study was the last date on which an individual contributed person-years at risk (last day of follow up period – 1st January 2008). All subjects enrolled in the cohort study that didn't die in study period or in follow up period were assumed to be alive.

For each client enrolled in the study the basic information was registered: socio-demographic factors (gender, age, ID number, educational level, employment status, habits of drug consumption such as type of drug, age of the first primary drug use, route of administration, duration and frequency of use, clinical data such as type of treatment, HIV status, hepatitis B and C status and number of overdoses).

Each person was marked only once, but every yearly treatment during the study period was registered. The intention was to create the dataset in which for each subject all medical, behavioral and social information, as well as frequency of treatment, change of the primary drug or change of route of administration is to be registered.

Living status was checked trough General Mortality Register. Data provided by that source was: demographic information, cause and date of death, all information connected with death such as place, time and circumstances (violent or not), reports on autopsy (in cases of overdoses and suspicious deaths). Causes of death were ascertained through record linkage with General Mortality Database. All the causes of death were classified according to the International Classification of Diseases, 10th revision (ICD-10).

12.2 Study results

The total number of enrolled abusers was 3 059. Males comprised 77.9% of the sample (2 384 male abusers and 675 female). Mean age of the enrollment in the cohort study was 27 years (27.2 years for males 95%CI: 26.92-27.41 and 26.4 for females, 95%CI: 25.91-26.92). Mean age data analyses at the time of entry in the study shows that there is a difference at the age of treatment start between men and women. Women come for treatment earlier than men. Mean ages of treatment start continuously grow trough study years. In the last study year we found out a decline of women's treatment start age.

Age of enrollment in the Cohort study was divided into five years categories. As expected, and according to the data on getting the treatment in the Republic of Croatia, the majority of subjects, 87.5% (M=87.5% and F=86.4%) started treatment until 35 years of age. The male/female ratio of enrollment was 3.5 to 1. (Table 12.1)

Table 12.1 - Age of enrolment in the study

Age of enrollment in the study	Gender				Total No.	%
	Male No.	%	Female No.	%		
15-19	131	5.5	65	9.6	196	6.4
20-24	773	32.4	259	38.4	1032	33.7
25-29	867	36.4	181	26.8	1048	34.3
30-34	321	13.5	78	11.6	399	13.0
35-39	150	6.3	50	7.4	200	6.5
40-44	91	3.8	29	4.3	120	3.9
45-49	51	2.1	13	1.9	64	2.1
Total	**2 384**	**100.0**	**675**	**100,0**	**3 059**	**100,0**

Source: Croatian Public Health Institute

Table 12.2 - Number of enrolled subjects and number of new never treated subject for each study year

Study year	Number of enrolled subjects	%	Number of enrolled new, never treated subjects	%
2000	1 150	37.6	555	48.3
2001	411	13.4	277	67.4
2002	379	12.4	258	68.1
2003	281	9.2	212	75.4
2004	205	6.7	162	79.0
2005	302	9.9	223	73.8
2006	331	10.8	243	73.4
Total	**3 059**	**100,0**	**1 930**	**63.1**

Source: Croatian Public Health Institute

Data in Table 12.2 presents number of subjects in the study. The highest number of enrolled abusers was in the first year of the study (1 150 or 37.6% of all study subjects). Following years enrolled similar number of new cohort subjects. Analyzing data on previous treatments among new study members it's clear that every study year involves approximately the same percentage of new (never treated in the health system) abusers, from 67.4%-79%.

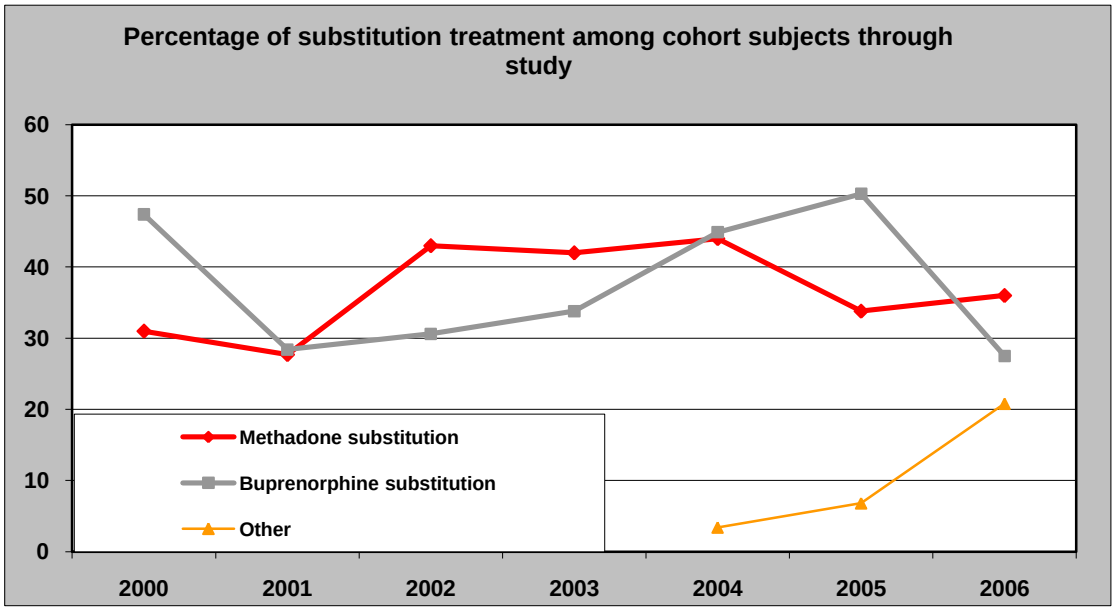
Treatment duration for each individual is determined by entry into treatment system (during the study) and exit which corresponded with day of death or the end of the study. During that study time cohort members accumulated certain numbers of yearly treatments. 191 people had showed up regularly every year in treatment facilities, 244 of them had 6 treatments, 288 of them 5 treatments, 374 had 4 treatments and 622 came two times during the study period. Only one treatment during the study had 324 abusers. From those who have appeared only once during the study period 44.8% (432 abusers) were enrolled in last two years of study so we can assume that they will get treatment in future.

Table 12.3 - Number of treatments of Cohort study members

Number of treatments during the Cohort study	Number of cohort members	
	N	%
1 treatment	324	30.2
2 treatments	622	20.3
3 treatments	416	13.6
4 treatments	374	12.2
5 treatments	288	9.4
6 treatments	244	8.0
7 treatments	191	6.2
Total	**3 059**	**100.0**

Source: Croatian Public Health Institute

Figure 12.1 - Substitution treatment among cohort subjects through study

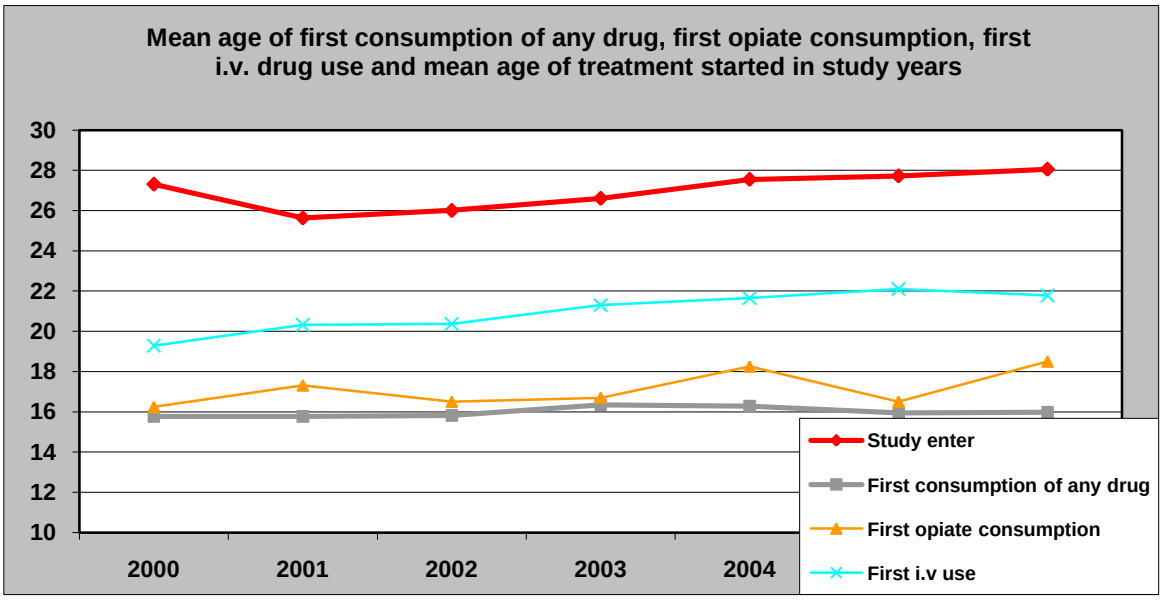


Source: Croatian Public Health Institute

Once study subjects start treatment they begin with different types of it. For most of them treatment was based on methadone substitution, psychiatric and psychological therapy and consulting. During the cohort study period 37.7% of all enrolled abusers were on some kind of substitution therapy, 34.8% of them were on methadone program and only 2.9% on buprenorphine therapy. Buprenorphine substitution therapy was not represented in the first few years of the study, because health insurance did not cover the expenses, so opiate abusers had to pay for it themselves. Since 2006, however, buprenorphine therapy has become more frequent due to its therapeutic benefits in relation to methadone substitution. In 2007 it became fully covered by health insurance. Since then the number of persons using that therapy increased (20.8% for the persons enrolled in 2006).

Drug dependence is developed through three major phases – first consumption of any drug, first opiate consumption and first i.v. drug use. According to data of mean age at the point of enrollment in the cohort study, first consumption of any drug, usually marijuana or hallucinogens wasn't changed during the study period. Young people experiment with drugs between the ages of fifteen and sixteen. Mean age of the first heroine consumption grows trough study period.

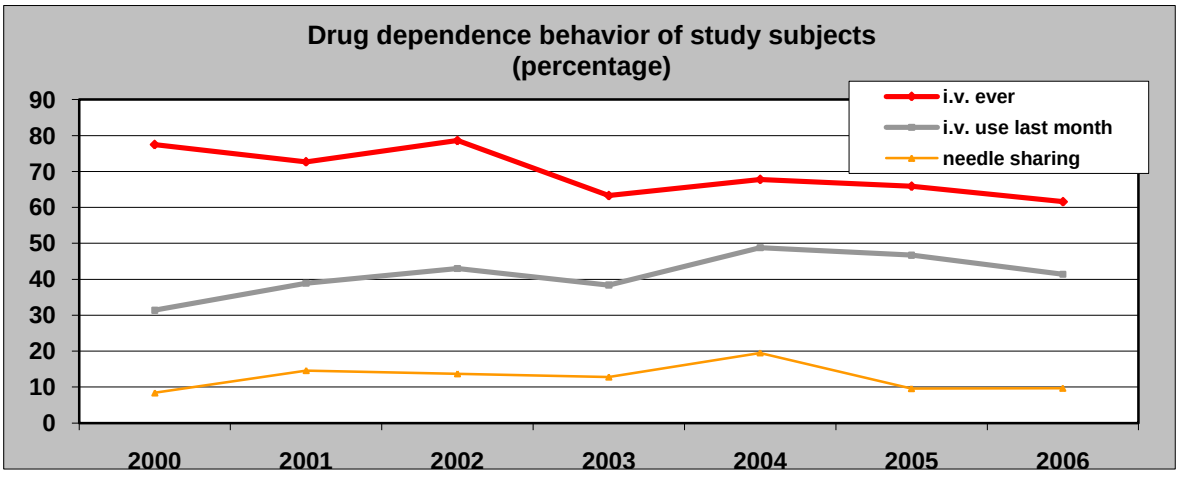
Figure 12.2 - Mean age of first consumption of any drug, first opiate consumption, first i.v. drug use and mean age of treatment started in study years



Source: Croatian Public Health Institute

Subjects enrolled in 2000 started with heroine consumption at the age of 16 and those enrolled at the last year of the study started at the age of 18.5. First i.v. drug consumption happened few years later. The mean age of first arrival in the treatment of opiate addicts went from 25.7 to 28 years. The main question is how to improve the start of treatment because abusers usually take drugs from the first experiments to arrival at the treatment for ten or more years. Characteristics of drug dependence behavior were defined by the following variables: route of administration of primary drug, HIV, HCV and HBV status, intravenous drug use, needle sharing, and frequency of drug use. Among enrolled subjects, 72.2% were intravenous drug users, 50.4% have been injecting drugs at least once per week and 11.3% of them shared needles and syringes. Figure 12.2 presents risk drug dependence behavior by study years. During the study period opiate's route of administration had been changed. In first few study years the percentage of i.v. drug users was between 70%-80%. From, 2004 risk drug behavior is in decline.

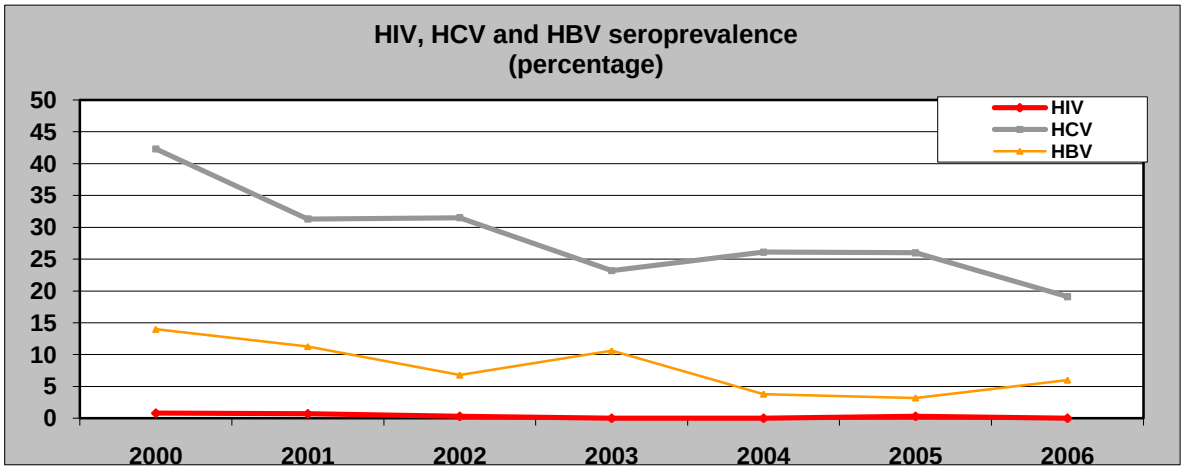
Figure 12.3 - Drug dependence behavior of study subjects



Source: Croatian Public Health Institute

Although the majority of the study population was intravenous users, only 11.3% of them shared needles and syringes. Therefore, the percentage of infectious diseases was very low. HIV positive status had 0.5% persons, HCV positive status 21.5% and HBV positive status 6.6 % of subjects.

Figure 12.4 - HIV, HCV and HBV seroprevalence



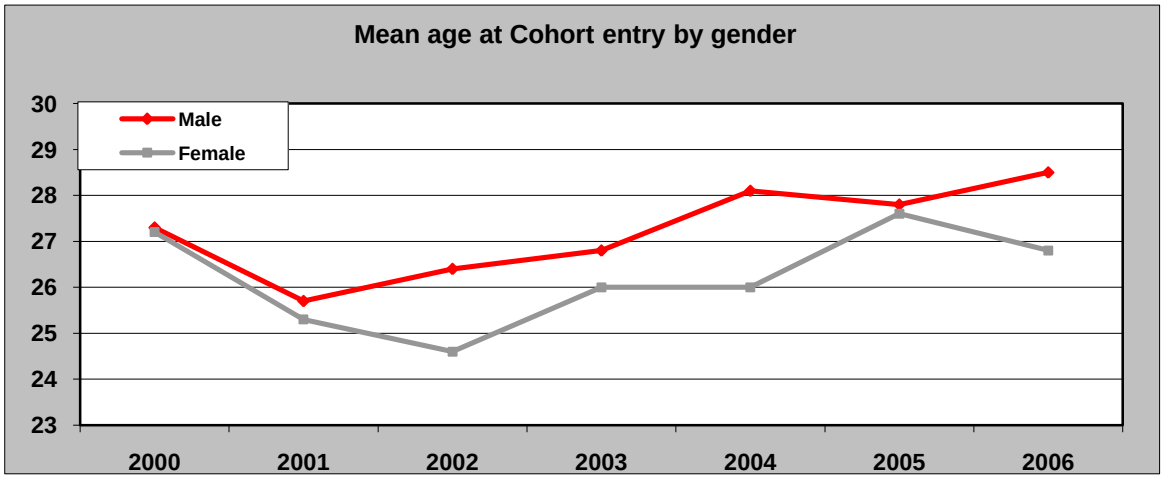
Source: Croatian Public Health Institute

Analyzing data on seroprevalence of diseases there was a drop of all diseases. Percentage of HIV positive persons was very low among cohort members through all years of the study. HCV and HCB seroprevalence was in constant decline through cohort years. In first year of study almost 45% of enrolled persons were HCV positive while only 19% of those who were enrolled in the last year were positive. Seroprevalence on HBV was in decline too, but it was found out a growth in the last study year.

12.3 General and specific mortality in the cohort study

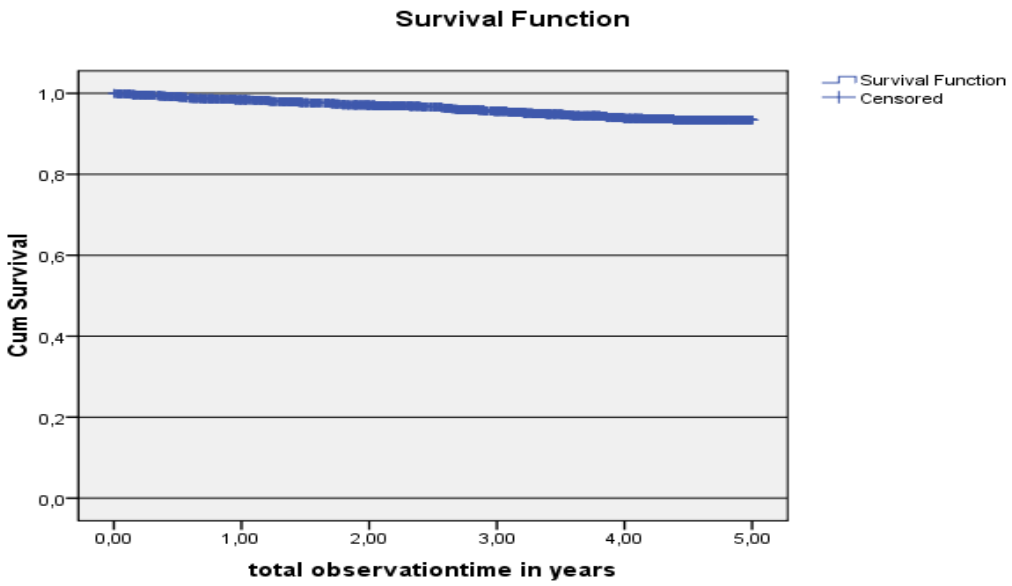
During the study period 3 059 subjects were enrolled, out of whom 2 885 (94.3%) reached the end of the study. The mean age of male subjects at the study entry was 27.2 years (95% CI: 26.92-27.41) and the mean age of female subjects was 26.4 years (95%CI: 25.91-26.92) (Figure 12.5).

Figure 12.5 - Mean age at Cohort entry by gender



Source: Croatian Public Health Institute

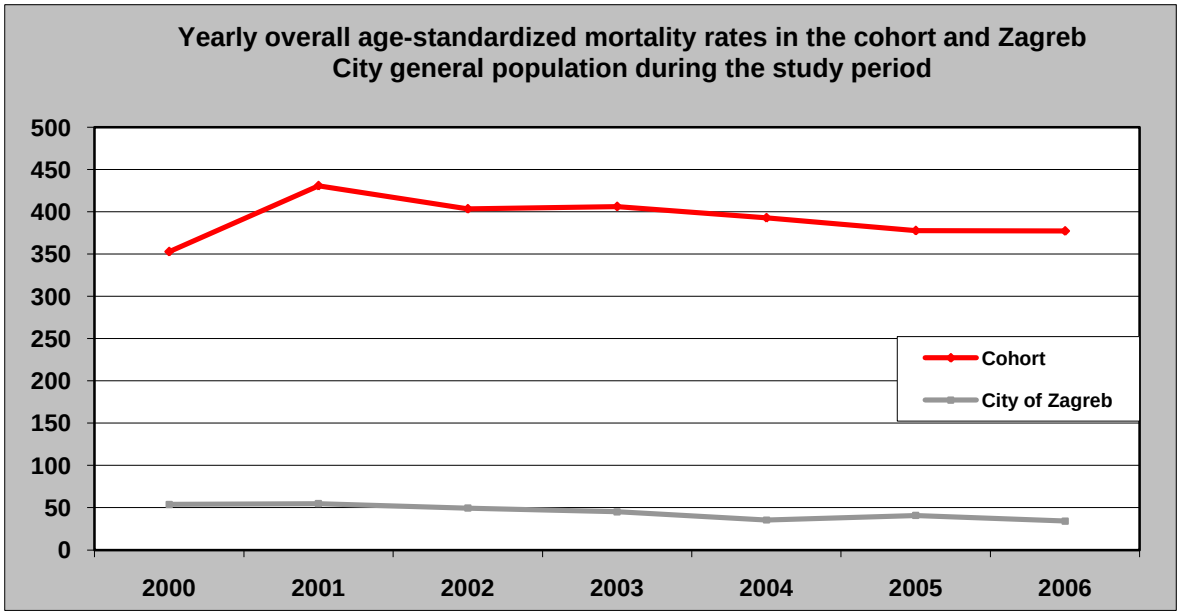
Picture 12.1- Survival function of cohort subjects



Source: Croatian Public Health Institute

Overall age standardized mortality rates of cohort population were continuously 7-9 times higher than Zagreb City population mortality rates, both standardized on Croatian general population according to the Census 2001. Standardized cohort mortality rate was highest in 2001 (431.0 per 100 000) and lowest in 2006 (353.0 per 100 000) (Picture 12.1)

Figure 12.6 -Yearly overall age-standardized mortality rates in the cohort and Zagreb City general population during the study period



Source: Croatian Public Health Institute

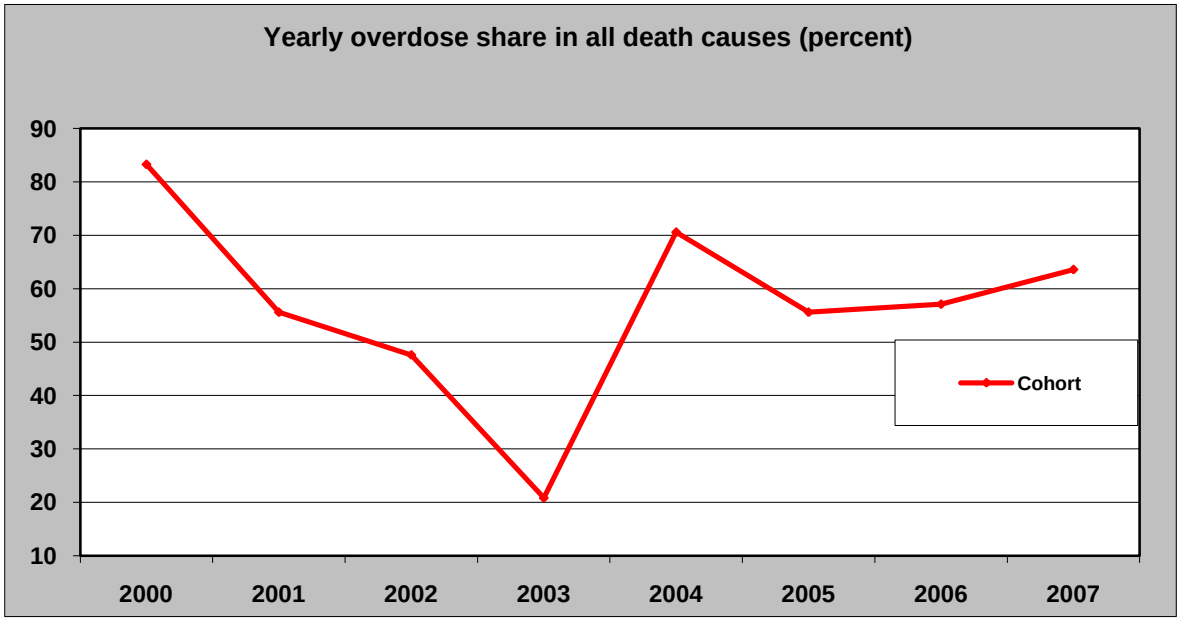
Table 12.4 - Causes of death among drug users who had been admitted for treatment in the study period

Death Causes (ICD10)		Male	Female	Total	Total %
Overdose (T40)	Accident (X40-X599)	84	7	91	52.3
	Suicide (X60-X84)	2	1	3	1.7
Other violent (not drug related)		23	2	25	14.4
Circulatory diseases (I00-I99)		8	1	9	5.2
Liver diseases (K70-K77 + B15-B19)		9	1	10	6.3
Neoplasm (C00-C97)		6	0	6	3.4
Respiratory diseases (J00-J99)		3	1	4	2.3
HIV (B20-B24)		1	0	1	0.6
Other		3	0	3	1.1
Unknown (R98, R99)		18	4	22	12.6
Total		**157**	**17**	**174**	**100.0**

Source: Croatian Public Health Institute

During the whole study period, 174 deaths occurred. Female and male subjects didn't significantly differ in the age of death distribution (Pearson χ-square test=5.846, df=6, p=0.441). The leading causes of death among males were overdoses (86 (52.3%) deaths due to overdose out of which 2 deaths by suicide) as well as among females (8 deaths due to overdose out of which 1 death by suicide (refer to Table 12.4)). Violent death (homicide, suicide and accidents) was the second largest category of death (14.4%). Among the violent and not drug related deaths there were 11 suicides (10 males and 1 female), 2 homicides (males), and 10 accidents (9 males and 1 female). Other most common causes of death were circulatory diseases (8 male and 1 female), liver diseases including hepatitis B and C (9 males and 1 female), malignant tumors (6 males) and respiratory diseases (4 males and 1 female). Other (2 unspecified sepses, and 1 duodenal ulcer) and not specified diseases attributed together in 18 male and 4 female death cases. Percentage of overdose as death cause among all death causes in the whole follow-up period was 50.0%, but was significantly changing by the study years taking minimum of 20.3% in 2003 and maximum 83.3% in 2000 (Pearson χ-square test=16.324, df=7, p=0.022) (Figure 12.7).

Figure 12.7 - Yearly overdose share in all death causes



Source: Croatian Public Health Institute

Table 12.5 - Person years of observation by the each study year

Study year	Males			Females			Total		
	Person-years of observation	Number of deaths	Standardised mortality rate	Person-years of observation	Number of deaths	Standardised mortality rate	Person-years of observation	Number of deaths	Standardised mortality rate
2000	278.32	6	21.6	72.61	0	0	350.93	6	17.1
2001	1 052.18	17	16.2	264.76	1	3.8	1 316.94	18	13.7
2002	1 404.37	21	15	367.3	0	0	1 771.64	21	11.9
2003	1 609	21	13.1	438.76	3	6.8	2 047.75	24	11.7
2004	1 773.56	15	8.5	491.64	2	4.1	2 265.2	17	7.5
2005	1 961.41	23	11.7	557.31	4	7.2	2 518.4	27	10.7
2006	2 173.59	24	11	626	4	6.4	2 799.59	28	10
2007	2 238.7	30	13.4	658.17	3	4.6	2 896.88	33	11.4

Source: Croatian Public Health Institute

In total, subjects accumulated 15 967.7 person-years. Male accumulated 12 491.13 person-years and female 658.17 person-years. Each subject enrolled in the study accumulated 5.22 mean person-years.

Table 12.6 - Mortality rate per 1 000 person years

	2000	2001	2002	2003	2004	2005	2006	2007	total
MR/1000 py	17.09743	13.66805	11.85342	11.72018	7.504856	10.71965	10.00146	11.39157	10.89703
95%CI max	38.05736	21.69403	18.18003	17.48591	12.07238	15.63138	14.48533	16.02365	12.64266
95%CI min	7.681089	8.611379	7.728461	7.855617	4.665432	7.351291	6.905556	8.098518	9.392417

Source: Croatian Public Health Institute

Crude cohort mortality rate was calculated as the numbers of deaths to the numbers of person-years of observation during the study period. MR 10.9 per 1 000 person-years (95% CI 9.4-12.6) (Table 12.5).

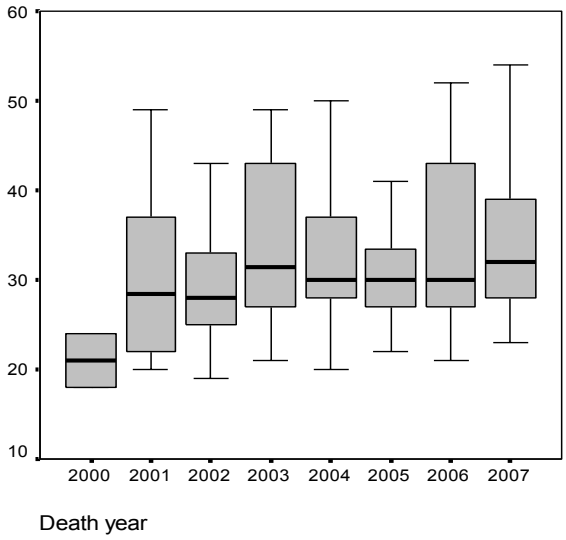
Table 12.7 - Mortality rate by gender /1000 person years

	Male	Female	Total
MR/1000py	12.5689189	4.88990522	10.89703
95%CI max	14.6971271	7.86594551	12.64266
95%CI min	10.7488845	3.03983457	9.392417

Source: Croatian Public Health Institute

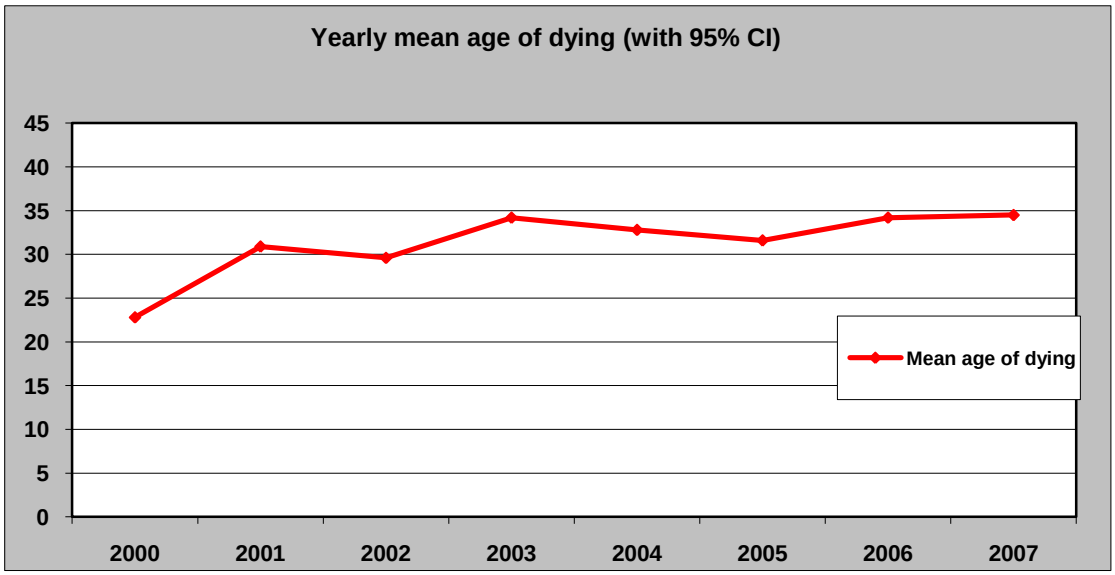
The mortality rate was higher for men than for women. Among males crude mortality rate was 12.6 per 1 000 person-years and among females the rate was 4.9 per 1 000 person-years. In total, 157 males (6.6%) and 17 (2.5%) females died during the study period which differed at the level of significance p<0.001 (Pearson χ-square test=16.220, df=1).

Picture 12.2 - Yearly distributions of age of dying



Source: Croatian Public Health Institute

Figure 12.8 - Yearly mean age of dying (with 95% CI)



Source: Croatian Public Health Institute

Before performing analysis regarding the association of treatment site (information taken at the study entry) and survival, the available 7 categories variables were subcategorized (center, hospital outpatient, hospital inpatient, daily hospital, NGO, community, other) into two categories variables: inpatient treatment or not. Among subjects that used to be treated within hospitals 30 of 431 (7.0%) died and among those who used to be treated in other ways 144 of 2628 (5.5% died). These death frequencies didn't differed significantly p=0.219 (Pearson χ-square test=1.514, df=1).

Investigating living conditions we found that subjects who were living alone (information at the time of their study entry) had higher death percentages (8.6%) comparing to those who were living with someone (with family, friend or partner) (4.8%). (Pearson χ-square test=6.993, df=1, p=0.008)

By the information provided if subjects were living together with other drug abusers (information taken at the study entry) there were no significant differences in mortality frequencies and/or survival. Among the subjects who were living with other drug abusers 21 (5.3%) subjects died during the study period. 110 (5.0%) subjects who weren't living with other drug abusers died (Pearson's χ-square test=0.084, df=1, p=0.772). Subjects that consumed opiates for the first time at the age 15-24 had lower death rates than those above that age group (4.6% deaths comparing to 6.9%). There were no significant differences p=0.084, Pearson χ-square test=2.987, df=1). By the information taken at the study entry if subjects were ever injecting drugs, there were borderline significant differences in death rates. Therefore among those who ever injected drugs 126 (5.7%) subjects died and among those who never injected drugs 18 (3.5%) subjects (Pearson χ-square test=3.849, df=1, p=0.050).

Cohort study analysis performed at the population of treated drug abusers in the City of Zagreb enables the insight in the population behavior and characteristics which might influence probability of survival in the respected period of time. Although the population has been closely followed in the existing register, and data on mortality was collected in harmonized, standardized way during years before the study, the comparison and matching of the two databases revealed the "grey" part of the population exposed to the increased risk of dying in connection to the drug addiction. Analysis indicated that type of treatment (in-patient or out-patient), living with other drug abusers had no influence on probability of dying earlier, but living conditions (alone/living with someone) have influence on probability of dying. Those who were living alone had higher death percentage. Age of the first use of opiates at the age range (15-24) had lower death rates from those above that age range.

These findings are to be considered as relevant bases not only for further analysis of the determinants which might influence negative drug dependence outcomes, but for the development and implementation of the preventive programs and programs for youth at risk. The study will be explored and used at every level of further approach to drug user population in the country.

PART C

13.1 Alphabetic list of all bibliographic references used

No Bibliographic reference

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13.2 Alphabetic list of relevant data bases

No	Type of register / data base	Responsible institution
1	Criminal offence evidences	Ministry of Justice
2	Death certificate and report on the cause of death	Croatian Institute of Public Health
3	HIV Register	Croatian Institute of Public Health
4	Information system of the Ministry of the Interior (Criminal evidences)	Ministry of the Interior
5	Internal databases on detainees and prisoners	Ministry of Justice
6	Misdemeanour evidences	Ministry of Justice
7	Matrix on all categories of prisoners	Ministry of Justice
8	Psycho-diagnostic data	Ministry of Justice
9	Statistical information - ISSN 1334-062X Data on death persons Data on perpetrators of criminal offences Dana on misdemeanour perpetrators	Croatian Bureau of Statistics
10	Register of persons treated for psychoactive drugs abuse	Croatian Institute of Public Health
11	Archive of scientific programmes and projects	Ministry of Science, Education and Sport
12	IT Database UZDA - Collection of personal data of clients participating in the Project of Social Reintegration of Drugs Addicts	Office for Combating Narcotic Drugs Abuse

13.3 Alphabetic list of relevant Internet addresses

No	Internet address
1	http://www.dzs.hr
2	http://www.hzjz.hr
3	http://www.mup.hr
4	http://www.mzss.hr
5	http://www.online-baze.hr
6	http://www.uredzadroge.hr
7	http://www.nijd.uredzadroge.hr
8	http://www.hck.hr
9	http://www.udrugaterra.hr
10	http://www.udruga-let.hr
11	http://www.emcdda.europa.eu

14 Annexes

14.1 List of tables used in the text

14.2 List of figures used in the text

14.3 List of pictures used in the text

14.4 List of full references of acts

No Act/Rulebook

1 Kazneni zakon Republike Hrvatske, NN 110/97, 129/00, 111/03, 105/04, 84/05, 71/06, 110/07, 152/08) (Criminal Code OG 110/97, 129/00, 111/03, 105/04, 84/05, 71/06, 110/07, 152/08)
2 Nacionalni program za mlade od 2009. do 2013., NN 82/09 (National Youth Programme for the period 2009 – 2013, OG 82/09)
3 Popis opojnih droga, psihotropnih tvari i biljaka iz kojih se može dobiti opojna droga te tvari koje se mogu uporabiti za izradu opojnih droga, NN 50/09 (List of narcotic drugs, psychotropic substances, plants used to produce narcotic drugs and substances that can be used in the production of narcotic drugs (precursors), OG 50/09)
4 Pravilnik o evidenciji potvrđenih optužnica, NN 82/09 (Ordinance on records of confirmed indictments, OG 82/09
5 Pravilnik o kaznenoj evidenciji, NN 92/09 (Ordinance on criminal records, OG 92/09)
6 Pravilnik o načinu ozvršavanja mjera opreza, NN 92/09 (Ordinance on the execution of precautionary measures, OG 92/09)
7 Pravilnik o načinu provođenja posebnih dokaznih radnji, NN 102/09 (Ordinance on conducting specific evidence collecting actions, OG 102/09)
8 Pravilnik o vrsti i djelatnosti doma socijalne skrbi, načinu pružanja skrbi izvan vlastite obitelji, uvjetima prostora, opreme i radnika doma socijalne skrbi, terapijske zajednice, vjerske zajednice, udruge i drugih pravnih osoba te centra za pomoć i njegu u kući, NN 64/09. (Rulebook on the type of social care home activities, the way of providing care outside your own family, the conditions of space, equipment and employees in a care home/centre, therapeutic community, religious community, association and other legal entities OG 64/09)
9 Pravilnik o snimanju dokazne ili druge radnje u prethodnom i kaznenom postupku, NN 92/09 (Ordinance on recording evidence collecting actions or other actions in pre-trial and criminal proceedings, OG 92/09)
10 Pravilnik o središnjoj evidenciji, očevidniku i drugim evidencijama koje se vode za zatvorenike kojima je određen istražni zatvor, NN 82/09. (Ordinance on the central register, investigative detention record and other registers held for detainees against whom investigative detention was ordered, OG 82/09)
11 Pravilnik o zvučnom snimanju rasprave u kaznenom postupku, NN 82/09 (Ordinance on audio recording of a trial in the criminal proceeding, OG 82/09)
12 Sudski poslovnik, NN 116/08, 125/08 (The Court Rules of Procedure, OG 116/08, 125/08)

13 Uredba o kriterijima za utvrđivanje korisnika i načinu raspodjele dijela prihoda od igara na sreću, NN 187/04 (Regulation on criteria for determination of beneficiaries and distribution means for part of the proceeds obtained from games of chance, OG 187/04)
14 Zakon o izmjenama i dopunama Zakona o socijalnoj skrbi NN 7/07 (Law on the Amendments to the Law on Social Welfare OG 7/07)
15 Zakon o izvršavanju kazne zatvora (NN 190/03,076/07, 27/08, 83/09) (Law on the Enforcement of Prison Sentence, OG 190/03,076/07, 27/08, 83/09
16 Zakon o državnom odvjetništvu, NN 76/09 (State Attorney's Office Act, OG 76/09)
17 Zakon o kaznenom postupku NN 152/08, 76/09 (Criminal Procedure Code OG 152/08, 76/09)
18 Zakon o ograničavanju uporabe duhanskih proizvoda, NN 125/08, 55/09, 119/09). (The Law on Restricted Use of Tobbaco Products, OG 125/08)
19 Zakon o policijskim poslovima i aktivnostima, NN 76/09 (Act on Police Activities and Powers, OG 76/09)
20 Zakon o sigurnosti prometa na cestama, NN 67/08 (Act on Road Traffic Safety OG 67/08)
21 Zakon o sudovima za mladež, NN 111/97, 27/98, 12/02. (Act on Juvenile Courts, OG 111/97, 27/98, 12/02)
22 Zakon o Uredu za suzbijanje korupcije i organiziranog kriminaliteta, NN 76/09 (Act on Office for Suppression of Corruption and Organized Crime, OG 76/09)
23 Zakon o suzbijanju zlouporabe opojnih droga NN, 107/01 87/02, 163/03, 141/04, 40/07, 149/09 (Act on Combating Narcotic Drugs Abuse OG 107/01, 87/02, 163/03, 141/04, 40/07, 149/09)
24 Zakon o zaštiti na radu, NN 86/08 (Act on Protection at Work OG 86/08)