



European Monitoring Centre
for Drugs and Drug Addiction

ISSN 1725-5767

THEMATIC PAPERS

Drug-related research in Europe:
recent developments and future perspectives

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Overview

Scientific findings and up-to-date evidence are needed for sound policymaking at local, national and EU level. Research can help answer many policy questions by investigating which interventions or combination of interventions may be more appropriate to help reduce drug problems. Research can also assess the cost-effectiveness of various alternative interventions and suggest innovative ways to increase effectiveness.

Both the European Commission and the Member States have been investing in drug-related research and promoting the development of a wider knowledge base to underpin drug policy. However, there has been no consistent approach at European level to identifying and prioritising research topics.

The EMCDDA has been monitoring drug-related research since 2007, as part of its mandate to provide 'the Community and its Member States with factual, objective, reliable and comparable information at European level concerning drugs and drug addiction and their consequences' ⁽¹⁾. The agency has developed a methodology to analyse research activity on the basis of the studies cited by Reitox national focal points in their Reitox national reports.

This Thematic paper therefore draws from a variety of sources, which include analysis of the yearly national reports submitted to the EMCDDA by the Reitox national focal points over the period 2008–10, projects funded through different European Commission research and drug-related programmes, and Council and Commission documents focusing on this topic. It aims to update the EMCDDA Selected issue on national drug-related research in Europe (EMCDDA, 2008), by reporting on recent developments and current challenges, and by suggesting future opportunities in this field.

⁽¹⁾ Regulation (EC) No 1920/2006 of 12 December 2006 on the European Monitoring Centre for Drugs and Drug Addiction (recast).

Introduction

Interest in drug-related research at European Union (EU) level as a topic of policy relevance can be traced back to the 1996 joint seminar on 'Drug research-related initiatives in the European Union', organised by the European Commission (EC), where representatives of Member States, the EMCDDA, the Reitox network and individual researchers were invited to discuss national research situations and needs, and to contribute with drug-related topics to the Fifth research and technical development framework programme (EMCDDA, 2008). This initiative followed Research Council conclusions on 'The role of research in the fight against drugs', which had called upon the Commission to consider drug-related research topics when preparing the Fifth Framework Programme and to identify, in consultation with the Member States, measures to enhance the research effort at Member State and Community level on this topic (Research Council, 1996).

The conclusions of the 1996 joint seminar addressed issues that are still relevant today, such as the value of cross-national collaboration, the role of the multidisciplinary approach, the importance of coordination arrangements and the sustainability of funding, the need for a wider availability and dissemination of research results, and the necessity to increase the dialogue between policymakers and researchers (Kenis, 1997).

Although there is no generally agreed definition of what constitutes drug-related research (Bühringer et al., 2009), research is now mentioned in the drug strategies and action plans of most Member States, and the need for evidence-based policy is highlighted in many of them (EMCDDA, 2008). The following section discusses definitions of drug-related research, and provides examples of recent or ongoing research at European level.

Research is mentioned in the 2005–12 EU drugs strategy under the cross-cutting theme 'information and research needs', which calls for a 'better understanding of the drugs problem and the development of an optimal response to it through a measurable and sustainable improvement in the knowledge base and knowledge infrastructure'. The strategy also identifies as one of its priorities that 'EU action plans should include priority research topics to be fostered at EU level, taking into account the rapid evolution of the drugs problem. Large-scale exchanges and dissemination of research results, experiences and good practices should be promoted at Member State and EU level' (Council of the European Union, 2004). The action plans (2005–08 and 2009–12) follow suit, with specific actions to promote research at different levels and foster information exchange to support policymaking (Council of the European Union, 2005; 2008). In 'Increasing the European knowledge base on illicit drugs' the main initiatives taken at European level to achieve the objective of the EU strategy are described.

In a 2008 Selected issue on national drug-related research, the EMCDDA described the situation in Europe in 2007 and the main developments that had taken place since the 1996 joint seminar. The review concluded that, comparing the 1996 and 2007 findings, the situation concerning drug-related research in Member States had developed in a positive way, particularly concerning the area of prevalence, incidence and patterns of use, in which all countries had recent or ongoing projects by 2007. It also confirmed the three-stage 'sequencing' in the development of national drug-related research (Kenis, 1997): countries that report a more recent tradition of drug-related

research mainly focus on epidemiological surveys and indicators, and other quantitative methods for estimating drug use. Later, research requirements expand to include not only the use of drugs, drug-related harm and the study of services, but also to the evaluation of policy and measures. In a third stage, research areas and topics may be further diversified to include social, psychological, medical and biological mechanisms behind drug use. The report further concluded that the dissemination of research had also developed significantly since 1996, with an increase in the number of drug research journals in Europe and the availability of new dissemination channels, notably those based on the Internet. Finally, it suggested that regular overviews and monitoring of drug-related research could be helpful in keeping stakeholders informed of developments in the area and in identifying limitations, gaps and priorities for the future.

Since the publication of the Selected issue, the EMCDDA has developed a methodology for collecting and analysing information on national drug-related research and disseminating it through the Annual report and a dedicated website ⁽²⁾. The methodology and results of the exercises are presented and discussed in the fifth section of this report (p. 13).

In 2008, a study entitled 'Comparative analysis of research into illicit drugs in the European Union' (Bühringer et al., 2009) was carried out for the European Commission, with the aims: of mapping and analysing key research areas, disciplines and trends as well as the capacity, infrastructure and model of coordination of drug-related research in the Member States, and at European and international level; to describe, for comparative purposes, the same topics in Australia, Canada and the United States; and to identify strengths and weaknesses in EU drug-related research as well as gaps in the knowledge infrastructure in this field, and to assess options for strengthening — if necessary — the drug-related research infrastructure.

⁽²⁾ EMCDDA drug-related research [thematic page](#).

Drug-related research: definitions and implementation aspects

Defining and categorising drug-related research is not an easy task. The definition should take into account different aspects of the field, such as the scope of the study (e.g. are all psychoactive substances involved, or only illicit ones?) and the approach (e.g. does monitoring equal research?). For analytical purposes, it is also necessary to consider the research discipline or, in the case of multidisciplinary studies, disciplines involved, and to develop a typology of drug-related research topics.

Bühringer et al. (2009) stated that there was still ‘no internationally accepted definition of research’ and opted for defining research as performing a methodological study, in order to test a hypothesis or answer a specific question. A definition of the scope of the object was not needed, since the study only included ‘research into illicit drugs’, but a reference was made to narrowing down the scope of the approach to ‘the use of scientifically accepted methods and procedures’, leaving out of the definition other ‘activities such as monitoring or compiling best-practice programmes’, which also aim at ‘the gathering of information to answer a question and advance knowledge’.

Considering multidisciplinary, ‘just as drug use cuts across broad sections of society, so drug-related research embraces numerous research disciplines, such as public health, psychiatry and psychology, sociology, medicine, law, criminology, political science and economics’ (EMCDDA, 2008). The EMCDDA study further suggested that ‘the drugs phenomenon needs to be studied with a comprehensive approach’. In fact, the multidisciplinary approach is generally accepted as a means to build understanding of the complex phenomenon of drug use and addiction (Kenis, 1997; Miller et al., 2010; Ritter, 2006). However, concerns are often expressed that, in practice, applying multidisciplinary approaches is not always straightforward or feasible (EMCDDA, 2008).

For the purpose of this Thematic paper, a definition that tries to bring together these different elements is adopted: drug-related research involves performing a study on illicit drugs⁽³⁾, which may involve a range of disciplines, through the use of scientifically accepted methods and procedures, in order to test a hypothesis or answer a specific question.

Approaches to categorising drug-related research include a typology developed by the Council of Europe’s Pompidou Group, which classifies studies under three broad headings: social drug research, psychological drug research and biomedical drug research (Muscat et al., 2009). Bühringer et al. (2009) proposed four categories for research on illicit drugs in the European Union: understanding drug use behaviour (an area that includes basic research — mechanisms and aetiology — and epidemiology); demand reduction; supply reduction; and policy analysis. The EMCDDA suggested its own categories (EMCDDA, 2008), which are closer, but not identical, to those of Bühringer et al. (2009), and which were further developed in 2009, as described in a later section of the current paper (p. 14).

⁽³⁾ ‘Illicit narcotic and psychoactive substances’ as defined by the [UN drug-related conventions](#).

To understand how the different types of research are implemented in practice, it is important to look into how research is carried out and funded, both at national and European level.

Research in Member States

In 2008, Reitox national focal points reported that about half of the drug-related research projects carried out in European countries were conducted in universities and one-third by public or governmental organisations. Specialised research centres exist in some countries, and some of these centres have a focus on social research whereas others have their origins in psychiatric clinics. Interdisciplinary issue-oriented, national research networks with sustainable funding do exist in a few countries, but cooperation between institutes and researchers at European level mainly takes place in the framework of EU-funded and multinational projects, such as the European school survey project on alcohol and drugs (ESPAD), one of the longer-standing examples of collaborative drug-related research in Europe (Bühlinger et al., 2009; EMCDDA, 2008).

The major funding sources in all Member States are national public agencies, usually linked to the ministries of health, science, education, justice and social or interior affairs (Bühlinger et al., 2009). In some instances, specific, time-limited national drug-related research programmes, possibly linked to the implementation of a national strategy or action plan, have helped build up research networks, increased the capacity and overall quantity and quality of research, but scientific production has not always been sustained after the programme stopped (EMCDDA, 2008). One of the more sustainable examples of a specific funding programme linked to the implementation of a national policy is the research programme in support of the federal drugs policy document under the Belgian federal programme BELSPO, which has been running since 2002 (BELSPO, 2012).

This situation, reported in 2008 and 2009, does not seem to have changed dramatically, as very few updates were reported to the EMCDDA between 2009 and 2011.

Research at EU level

At EU level, the European Commission's **7th Framework programme for research and development** (2007–13), commonly referred to as FP7, and particularly its 'Cooperation' programme, support drug-related research through calls for research proposals that are of relevance to the drugs field ⁽⁴⁾. In this context, specific reference should be made to the more recently funded projects, which include: Access to opioid medication in Europe (ATOME), Psychosocial factors relevant to brain disorders in Europe (PARADISE), Size and burden of mental disorders and other disorders of the brain in Europe, Addictions and lifestyles in contemporary Europe — reframing addictions project (ALICE-RAP) and Grasping the links in the chain: understanding the unintended consequences of international counter-narcotics measures for the EU (LINKSCH). One particularly interesting funding mechanism that is made available by FP7 is the setting up of ERA-NETs — European networks for particular research areas. ERA-NETs are a funding tool 'to develop and

⁽⁴⁾ An overview of EU-funded research projects over the last 10 years, including the ones mentioned in this Thematic paper, is available at the EMCDDA research [web area](#).

strengthen the coordination of national and regional research programmes'. Under the ERA-NET scheme, national and regional authorities identify research programmes they wish to coordinate or open up mutually. The participants in these actions are therefore programme 'owners' (typically ministries or regional authorities defining research programmes) or programme 'managers' (such as research councils or other research funding agencies managing research programmes) (CORDIS, 2012). Under the 2012 work programme of the cooperation area 'social sciences and humanities', a call was launched for the setting up of an ERA-NET on the topic of 'drug demand and supply reduction'. A European consortium applied to this call with a project called ERANID (ERA-NET on illicit drugs), which aims to promote integrated European research on illicit drugs. If funded, this project could promote a coordinated approach to funding drug-related research in Europe.

The European Commission is also funding other drug-related studies as part of different programmes, such as the 'Drug prevention and information programme', the 'Prevention of and fight against crime programme' and the 'Health programme', which may yield important insights into the challenges facing Member States in this field and contribute to the implementation of the current EU strategy and action plan on drugs. Projects such as 'New methodological tools for policy and programme evaluation', 'Further analysis of the EU illicit drugs market and responses' and 'European standards in evidence for drug prevention' are funded by the European Commission with the explicit purpose, among others, of contributing to the improvement of information on drug use and to generating and disseminating health information and knowledge.

Bühninger et al. (2009) found that most of the European Commission funding instruments, however, were underutilised, partly because many researchers lack knowledge and experience of them, but also because specific drug-related funding opportunities were rarely published. Bühninger et al. (2009) also suggested a wider use of the FP7 Marie-Curie fellowship programme, and of the funding mechanisms under COST (European Cooperation in Science and Technology) and the European Science Foundation.

Dissemination of findings

Another important step of the cycle needs to be addressed here, as 'science is meaningless unless the lessons learnt from it are communicated' (Miller et al., 2010). The dissemination of research findings in the drugs field, as in science in general, is mainly achieved through the publication of articles in peer-reviewed journals (Sánchez-Carbonell et al., 2005). Twenty-eight peer-reviewed journals that are specialised in drug research are published in Europe ⁽⁵⁾; around 20 of those are published in languages other than English, but with English abstracts. Much drug-related research carried out in Europe is also published in journals based in North America or in journals covering general disciplines such as medicine, psychology, sociology, policy, criminology, law, toxicology and economics (EMCDDA, 2008).

In Europe, the publication of drug-related research is unevenly distributed between countries, with western European countries, in particular the United Kingdom, in the lead. Research findings funded by governmental or non-governmental organisations are often published in hard copy or on

⁽⁵⁾ See the EMCDDA drug-related research [webpage](#).

the websites of these organisations, and in their national languages. Most of this information never makes its way into the scientific literature databases and therefore remains available only to a limited audience (EMCDDA, 2008).

The existence of language barriers and the need to improve the visibility and accessibility of European research findings published in non-English language scientific journals were also mentioned by Bühringer et al. (2009), who called for the creation of a common European database for drug-related research projects, so that core information on all research activities could be centralised and made available, at least in English.

Increasing the European knowledge base on illicit drugs

The study 'Comparative analysis of research into illicit drugs in the European Union' (Bühringer et al., 2009) concluded that research capacity, overall quality and funding availability varied widely in the European Union, and that there was a considerable need for capacity building and for funding to cover a broader range of policy areas linked to the EU drug action plan. It also found that, although comprehensive expertise existed in Member States, improved data comparability between countries and increased visibility of research should be pursued.

Taking the main research areas of 'understanding drug use', 'demand reduction', 'supply reduction' and 'policy', Bühringer et al. (2009) found a considerable difference between the identified national research priorities and the number of studies available, particularly in the areas of 'supply reduction' and 'policy', which seemed to be relatively under-researched, or for which findings were not available. Under 'demand reduction', prevention was the least-researched area, although most countries considered it to be a national priority. For the 'understanding drug use' research area, the major weakness was a lack of studies in a number of areas, including on the relative contribution of biological and psychological factors, and on cultural, economic, legal and social factors. Compared to other study areas, research on the epidemiology of drug use was found to be more common and well-established in most countries, a finding in line with the conclusions of the Selected issue (EMCDDA, 2008).

Participation in European research activities was found to vary considerably between countries, with the majority of the eastern European countries being under-represented in EC-funded projects, and much of the international cooperation taking place on an informal basis. However, the study emphasised that drug-related research can be facilitated by European and international networks of researchers.

The Council of the European Union further discussed the topic of drug-related research at the Council's Horizontal Working Party on Drugs. In late 2009, the Swedish Presidency issued Council Conclusions on 'strengthening EU research capacity on illicit drugs' (Council of the European Union, 2009).

This document identified the cause and nature of drug problems and evaluation research as the main EU research priorities in the field of illicit drugs. It invited Member States to strengthen their research capacity and coordination mechanisms, to further explore opportunities provided by FP7, and to actively contribute to consultations on the future European research policy and the future objectives of drug-related research under the next EU drugs strategy.

The Council also established an annual exchange on drug-related research at EU level within the framework of the Horizontal Drugs Group (HDG) and with the contribution of the EMCDDA. Such exchange already took place in 2010 and 2011, and the HDG acknowledged the need to improve access to research findings for policymakers and professionals, and called on the EMCDDA to provide and disseminate, via its [thematic web area on research](#) and its [Best practice portal](#), drug-related research information and findings.

At the same time, research activities have received support from FP7 and other financial programmes, as reported in the previous section. However, concerns have been voiced that funding for addiction research has been stagnating in Europe, where it is below the levels provided in countries such as China and the United States, at least in some specific areas (Helinski and Spanagel, 2011).

Increased visibility of and accessibility to research findings would also contribute to the expansion of the European knowledge base on drugs within and beyond the academic world. An important initiative for drug-related research was the publication 'Projects, studies and research on illicit drugs funded by the European Commission 2007–10' (European Commission, 2011). This report provided a comprehensive overview of projects funded under the 'Drug prevention and information programme', 'The prevention of and fight against crime programme', the 'Health programme' and FP7, including — where available — a summary of actual or expected results.

The Pompidou Group maintains an [online research register](#) intended for the research community, where researchers can insert the information they want to share concerning their projects and consult the information provided by other researchers, research institutes, funding agencies, calls for collaboration and calls for tender. The register contains information on 629 individuals and 145 research projects (Pompidou Group, 2012). However, there is no independent quality check on the information entered, which limits the usefulness of this initiative (Bühlinger et al., 2009).

In a more general context, the European Commission-funded initiative 'Open access infrastructure for research in Europe' ([OpenAIRE](#)) aims at supporting the implementation of a free, rapid and transparent access to European research outputs and findings. Recipients of grants from the European Research Council or from most of the research areas under FP7 are obliged to make their publications and other outputs available on the OpenAIRE website. Although still new, this repository may prove to be an important tool for accessing, disseminating and transferring into practice drug-related research findings. It may also help to build better research activity indicators, as researchers themselves seem to agree that published outputs of research projects should be the basis for assessing the research situation in Europe (Bühlinger et al., 2009; Helinski and Spanagel, 2011; Sánchez-Carbonell et al., 2005).

Two European research networks that cover drugs and addiction were set up in 2010: the European Society for Prevention Research and the European Federation of Addiction Societies. In addition, a third one, ERANID (see 'Drug-related research: definitions and implementation aspects'), should be formalised before the end of 2012. Such networks may prove to be a way forward for overcoming limitations and gaps in drug-related research, further disseminate research findings, and influence priorities and the allocation of funding (EMCDDA, 2008; Mann, 2012).

Horizon 2020, the European Union's new programme for research and innovation

Horizon 2020 will provide the framework for European drug-related research in the future. It will address research and innovation together, with the aim of contributing to tackling societal challenges, as a basis for sustainable economic growth. This focus has the potential to promote cross-cutting coordination and coherence in funding for multidisciplinary topics, such as drug-related research.

In the public consultation held by the Commission on the EU framework for research and innovation, the EMCDDA's Scientific Committee presented detailed recommendations (EMCDDA's Scientific Committee, 2011) under the following general priorities:

1. EU research and innovation **funding that maximises the benefits of acting at the EU level is vital**, particularly in cross-border research on societal challenges, such as drug-related research. There is a need for well-coordinated research across the European Union, where common research questions are answered. The use of appropriate methods, designs and instruments, both qualitative and quantitative, facilitates the generation of more statistically powerful samples and allows for robust comparisons.
2. The future common strategic framework can only **make EU research and innovation funding more attractive and easy to access for participants** if the whole process is made more transparent and easier to follow up on, even by inexperienced EC-funding applicants.
3. **EU funding needs to improve in terms of how best to cover the full innovation cycle**, which goes from research to practice, by analysing and strategically prioritising the research topics and gaps in each area, coordinating research calls in a complementary way, especially for cross-cutting areas, and by further promoting the dissemination and implementation of research findings.
4. **Greater priority needs to be given to researcher-initiated projects**. Further coordination needs to be promoted on research topics and findings between the bottom-up research projects, currently funded under the European Research Council, and the top-down ones, currently funded under the cooperation programmes, so that the advantages of both approaches can be optimised and world class excellence in research is achieved.
5. **Indicators for monitoring EU research and innovation funding** should continue to focus on scientific quality but also on dissemination of findings, capacity building and knowledge transfer.

Monitoring drug-related research in Europe using Reitox national reports

Gathering information on research that is funded and carried out at national level is an important part of the monitoring activity of the EMCDDA. Currently, there is no systematic inventory of drug-related research activities in Europe. In this section, we present an analysis that aims to give an indirect assessment of this area. Among other uses, monitoring and disseminating information on drug-related research may help countries: to identify knowledge gaps; to know whether the funded areas are consistent with the policy priorities; and to know where to look for potential partners, scientific advisors, or both for their own projects.

Collecting and analysing data on drug-related research

Since the publication of the Selected issue on drug-related research in Europe (EMCDDA, 2008), the EMCDDA has developed a new methodology to collect information on drug-related research by analysing the full text of the yearly Reitox national reports and using this information as a proxy for relevant drug-related research conducted at national level. After discussions with representatives of the Reitox network, during an expert meeting in 2009 ⁽⁶⁾, the following methodology was adopted.

Step 1 — data collection

The full text of the annual Reitox national reports was searched for four keywords: survey, research, study and studies. Information about research and related bibliographic references cited in the text that pertain to the period up to two years before the date of the National report were collected and inserted in a database. In addition, relevant web links, where available, were also collected and tested, and broken links were excluded.

Each study was recorded in the database only once, regardless of how many times it was mentioned in the original text. References to EC-funded projects carried out by several countries were recorded only once, namely in the coordinating country (e.g. DRUID, coordinated by Germany), except when there was a reference to the use of national data. European projects funded nationally were recorded for each country that mentioned them (e.g. ESPAD).

Research mentioned in the following contexts was excluded from the main database: national drug strategy documents; implementation of research findings in training, manuals and guidelines; establishing of new research agencies; public spending on drug-related research; press reports.

⁽⁶⁾ The meeting took place at the EMCDDA in October 2009 with the participation of EMCDDA staff, invited experts from ECDC and BELSPO and the Reitox national focal points of Germany, Ireland, Estonia and Portugal. The minutes were afterwards made available to the entire Reitox network with an opportunity for further input from those who had not attended the meeting.

Findings for which a study could not be identified or which had anecdotal origins were either excluded or recorded into a general information list (see below) for each country.

Step 2 — data validation

Based on the information collected in Step 1, each Reitox national focal point received a draft, summarised list of identified studies. They were given an opportunity to send comments, updates and corrections before information on drug-related research was published. The database and additional lists were corrected according to the feedback received during the validation process.

Step 3 — data analysis

Several approaches may be used to classify drug-related research (Bühringer et al., 2009; Sánchez-Carbonell et al., 2005). For the 2008 Selected issue, the EMCDDA suggested five categories that give a comprehensive picture of the main areas involved and could serve decision-makers well. The list of categories was compiled based on a previous attempt (Kenis, 1997), as well as an informal consultation with members of the EMCDDA Scientific Committee, and experts' opinions (see above). In addition, two categories were added: one on markets and supply (outside the scope of the 2008 publication) and another on methodology issues, which are often linked to national initiatives to implement the EMCDDA key epidemiological indicators or other types of requested data. The seven research categories are:

1. Prevalence, incidence and patterns of drug use — this category includes (general and specific, including school) population surveys, estimates of problem drug use, studies on the characteristics of drug users or patterns of drug use;
2. Responses to the drug situation — this category includes studies on demand reduction interventions such as the evaluation of interventions (treatment, prevention, etc.), the implementation of policies and laws, estimates of public expenditure and other economic topics;
3. Determinants of drug use — this category includes studies on risk and protective factors for drug use;
4. Consequences of drug use — this category includes studies on health, social and legal consequences of drug use;
5. Mechanisms of drug use and effects — this category includes neurobiological, pharmacological and behavioural studies, as well as research on the aetiology and developments of drug use;
6. Supply and markets — this category includes studies on supply reduction interventions, such as law enforcement interventions, as well as studies on market characteristics, such as the availability and purity of drugs;
7. Methodology issues — this category includes feasibility and validity studies on the implementation of EMCDDA indicators and comparisons between different methodologies.

Drug-related research studies were analysed and categorised in the context in which they appeared in each Reitox national report. General information on drug-related research, referred to above, was not categorised.

The approach described here was applied to the Reitox national reports for the years 2008, 2009 and 2010.

Results of the analysis

For the period 2008–10, a total of 1 808 references to ongoing studies in the Reitox national reports were extracted and categorised. The results reveal that, similarly to the findings presented in the 2008 EMCDDA Selected issue, the majority of research was conducted in three areas: on responses; on consequences of drug use; and on prevalence, incidence or patterns of drug use (Figure 1). Studies on supply and markets, determinants of drug use and risk and protective factors, mechanisms of drug use and effects, and methodology aspects made up only 16% of all studies.

The findings also reveal that the total number of reported references increased every year, both overall and in the majority of research areas (Figure 2). The average number of studies mentioned in any national report increased from 14.3 in 2008, to 23.1 in 2009 and 26.3 in 2010. There was, however, large variation among countries: the minimum number of studies mentioned in a national report in the three reporting years — reported by different countries — was three, while the maximum number of studies mentioned in a national report — always by the United Kingdom — increased from 86 in 2008, to 133 in 2009 and to 137 in 2010.

Figure 1. Research subjects of national drug-related studies cited in the 2008, 2009 and 2010 Reitox national reports (percentage of all studies cited)

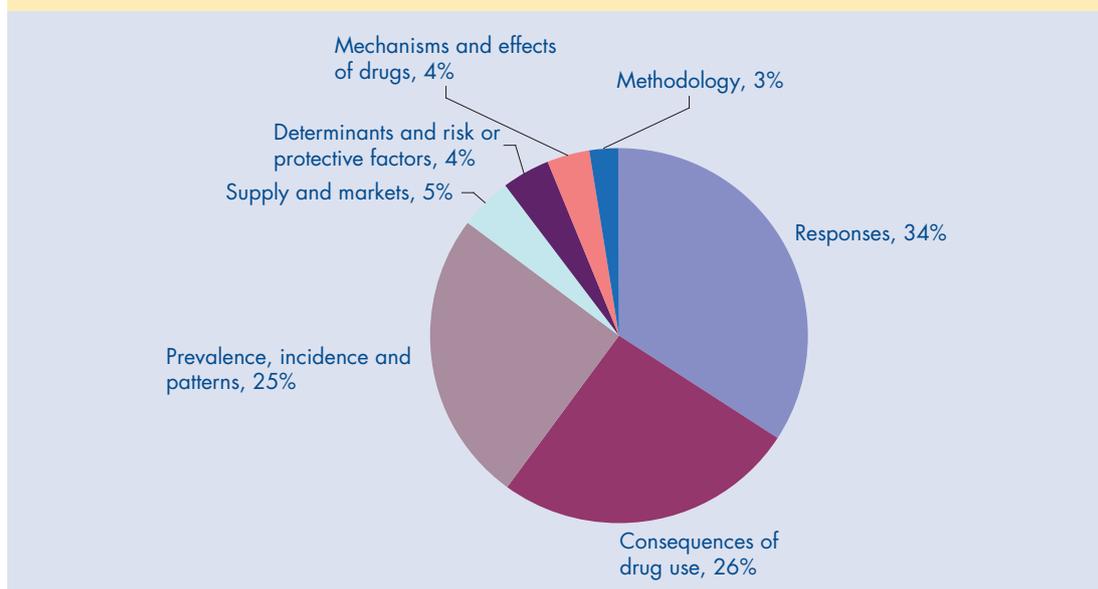
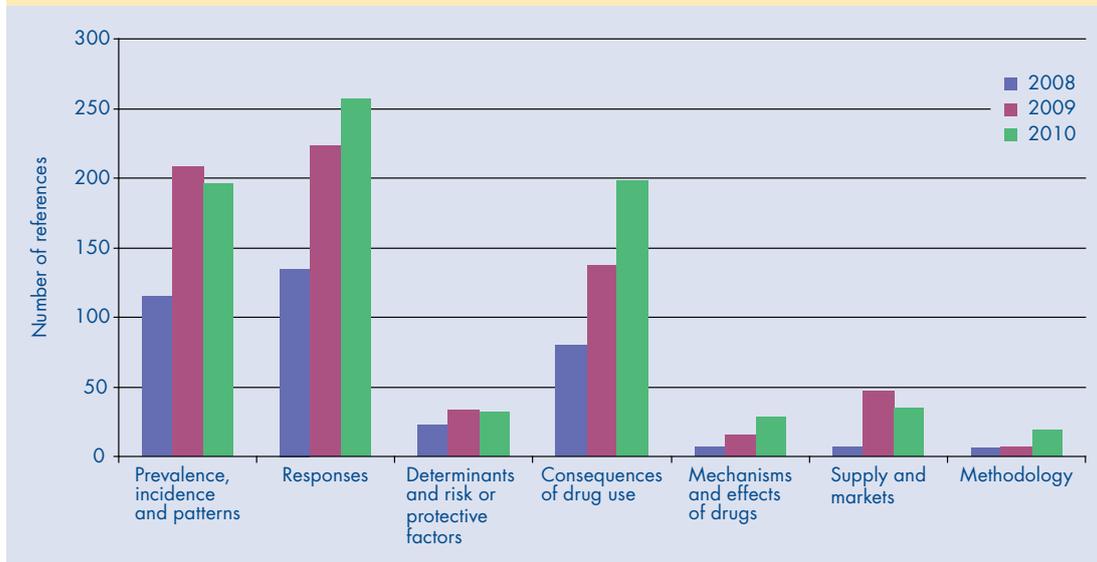


Figure 2. Research subjects of national drug-related studies cited in the 2008, 2009 and 2010 Reitox national reports (absolute figures per year)



NB: In 2008, 372 references for the years 2006–08 were cited in 26 national reports; in 2009, 671 references for the years 2007–09 were cited in 29 national reports; in 2010, 765 references for the years 2008–10 were cited in 28 national reports.

Interpretation of the results

After the first data collection and analysis had been completed in 2009, a memo was prepared for the Reitox national focal points explaining the objectives of this exercise and its methodology, and containing recommendations for the reporting of research activities in the national reports. While the increase in the number of cited research studies observed between 2009 and 2010 may reflect an actual increase in the number of drug-related research studies carried out, it is also possible that it reflects to some extent an increased awareness of the exercise. In addition, the topics chosen for the EMCDDA Selected issues (7) for each reporting year may have also contributed to the increase observed in the number of cited studies in research areas linked to these topics, especially because some research studies were carried out specifically to fill in evidence gaps for the topics covered in the Selected issues. As such, it may be interesting to assess how responses of national focal points to the reporting needs of the EMCDDA influence research in Member States in areas where evidence is lacking.

As Reitox national reports are drafted according to topics and guidelines agreed between the EMCDDA and the Reitox focal points and with the ultimate aim of meeting the EMCDDA's reporting needs, not all areas of drug-related research may be represented equally in the national reports.

(7) The Selected issues are in-depth reviews of topical interest. They are based on information provided to the EMCDDA by the Reitox national focal points as part of the national reporting process and are targeted at policymakers and their advisors as well as specialists and practitioners in the drugs field.

For instance, while there is ample citation, and sometimes even full description, of research related to the drugs situation and responses to it, studies on the neuroscience of drug use are rarely reported, even in countries where this research is known to be carried out. In addition, the information reported on research outputs depends on the availability of such information at the national focal points. As finding and categorising information for the analysis described above depends on the use of a limited number of keywords and correct bibliographic referencing, some references may have been mistakenly excluded or misclassified. However, due to the validation process, this exclusion or misclassification may have been minimal.

Usage statistics about the [thematic web area](#), where information on drug-related research in Europe is accessible to the general public and the scientific community, have been collected since September 2009. These logs show an increase in visits from all over the world, with an average of more than 300 visits per month between September 2009 and December 2011. The results of this analysis have been presented in EMCDDA publications, as well as in country overviews — which are updated on a regular basis — and in presentations to the Horizontal Working Party on Drugs' annual dialogue on research. Furthermore, input based on these results is given, on demand, to the European Commission, the Council and Parliament, national funding programmes, national experts, EU presidency initiatives, and European projects and conferences. Overall, this data collection exercise has proven to be useful to several stakeholders, ranging from the national focal points to EC-funded projects, potential applicants to FP7 and other programmes' calls, and decision-makers at European and national level.

Conclusions and implications for future work

European research cooperation complements and adds value to national research (Bühringer et al., 2009; EMCDDA, 2008). The drugs problem knows no borders, and cross-border aspects of the drugs problem must be researched and tackled at a multinational level. At European level, it is possible to launch large-scale, multi-site and longitudinal studies that enable more powerful analysis of key aspects of the drug phenomenon, such as the causes of onset of drug use or dependence, or the influence of different social, cultural and economic factors on drug use. Furthermore, research coordinated at European level may take a multidisciplinary approach and cover a diversity of disciplines that may not all be available in one country.

An efficient and coherent drug-related research policy is based on an understanding of the different agendas or objectives of research and policy. Policymakers want rapid and unambiguous answers. Science takes time and gives relative truths. Science enables policymakers to understand the drug situation, and scientists draw important research topics from the political agenda. Although policymakers and researchers often have different agendas and priorities, they may all benefit from well-functioning multidisciplinary research networks producing policy-relevant output at national and EU level (Garretsen et al., 2010).

The overall developments in recent years are encouraging. Studies and research findings are increasingly being used by EU Member States, European collaboration is being promoted by EU bodies, research projects and societies and a number of other initiatives, such as collaborative academic centres (Garretsen et al., 2010), drug-related scientific paper awards and academic summers schools, are contributing to 'promote, coordinate and improve more addiction research in Europe and to make its usefulness clearer to policy, public health and the general public' (Bühringer, 2012). However, there is still room for further improvement, and continuity and sustainability of the reported developments need to be ensured.

Well-functioning coordination between research and political decision-making is a prerequisite for sustainable, comprehensive and relevant research, but also for knowledge transfer among the scientific community, between research and practice and between science and the decision-making process (EMCDDA, 2008). To promote dialogue and coordination, mechanisms such as public hearings and consultations, such as the 1996 joint seminar on 'Drug research-related initiatives in the European Union', organised by the European Commission, could be developed for policymakers, civil society (through research associations, for example) and scientists to voice their needs and promote a common understanding of evidence gaps and a long-term, comprehensive research strategy. Having a stable funding strategy and framework for research at national and EU level would optimise investments in this area and would allow for more synergies to be created. Accessibility of research is also an important consideration for an efficient use of the findings and for the allocation of resources. Research results should be made available widely and promptly, preferably in different languages, to professionals and policymakers, so that they can be put into practice.

There are potentially large resources available for drug-related research if research and policy join forces across the European Union. Member States may cooperate to establish a platform for the

identification of priorities for research in the drugs field and the development of a joint strategy, which would lead to the pooling of resources and the launch of joint research projects, and enhance collaboration between researchers from different countries. The forthcoming ERANID project (see 'Drug-related research: definitions and implementation aspects') is a step in this direction. Sustainability, however, needs to be ensured even in those areas that currently account for much of the research activity. And more needs to be done to match the current research efforts with adequate funding (Bühringer, 2012). The existence of high-quality national research programmes and structures is particularly important if Europe is to establish a sustainable multi-national scientific community that may support evidence-based practice and policy in the future. The new EU common strategic framework for research, Horizon 2020, will start in 2014 to address both research and innovation. This framework has the potential to promote coordination in the funding of multidisciplinary areas, such as drug-related research.

The methodology developed by the EMCDDA to collect information on drug-related research through Reitox national reports has been proven to be a valuable monitoring exercise, used by several stakeholders in the field. The results reveal two major findings: during the period studied, the number of references to ongoing research or studies increased, and the majority of studies were conducted in three areas (prevalence, incidence or patterns of drug use; responses; and consequences of drug use). This contribution could be further developed to provide continued support to decision-makers at European and national level. The EMCDDA may also work to provide further support to the European scientific community, national and European funding programmes and European research projects, in order to further promote synergies, avoid overlaps and increase the dissemination of research resources and research findings.

The changing nature of European drug problems, together with the growing importance of the Internet and mobile communication, present both challenges and opportunities for research. Research into the changing patterns of drug use, drug-related public expenditure, and the cost-effectiveness of interventions is especially required, as budget cuts and financial concerns across Europe focus attention on the need to understand the relative benefit to cost of different policy options.

The EMCDDA and its Scientific Committee are committed to contributing to this process through a proposal for an agreed methodology for identifying evidence gaps in the research. Such an evidence-based, systematic approach could be an important tool to support both EU institutions (for example, the Horizontal Working Party on Drugs, through its annual dialogue on research) and national stakeholders.

Acknowledgements

Authors: Maria Moreira, V. Anna Gyarmathy, Margareta Nilson; contributor, Roland Simon

The EMCDDA would like to thank the heads of Reitox national focal points and their staff, the services within Member States that provided data and the members of the Scientific Committee of the EMCDDA for their help in producing this Thematic paper.

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Additional online resources

7th Framework Programme/Cordis website http://cordis.europa.eu/fp7/home_en.html

COST (European Cooperation in Science and Technology) <http://www.cost.eu/>

Drug prevention and information programme (Directorate General for Justice <http://ec.europa.eu/justice/funding/intro/>

EMCDDA Best practice portal <http://www.emcdda.europa.eu/best-practice>

EMCDDA Research web area <http://www.emcdda.europa.eu/topics/research>

European Science Foundation <http://www.esf.org/home.html>

Green Paper on a common strategic framework for future EU research and innovation funding
http://ec.europa.eu/research/csfr/pdf/com_2011_0048_csf_green_paper_en.pdf

Health programme (DG Health and Consumers)
http://ec.europa.eu/health/programme/policy/index_en.htm

Horizon 2020 website <http://ec.europa.eu/research/horizon2020>

Prevention of and fight against crime programme (Directorate General for Home Affairs)
<http://ec.europa.eu/homeaffairs/policies/intro/>

Reitox national reports (2007–11) available from http://www.emcdda.europa.eu/publications/searchresults?action=list&type=PUBLICATIONS&SERIES_PUB=w203

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The European Monitoring Centre for Drugs and Drug Addiction (EMCDDA) is one of the European Union's decentralised agencies. Established in 1993 and based in Lisbon, it is the central source of comprehensive information on drugs and drug addiction in Europe.

The EMCDDA collects, analyses and disseminates factual, objective, reliable and comparable information on drugs and drug addiction. In doing so, it provides its audiences with an evidence-based picture of the drug phenomenon at European level.

The Centre's publications are a prime source of information for a wide range of audiences including policymakers and their advisors; professionals and researchers working in the drugs field; and, more broadly, the media and general public.

The EMCDDA Thematic papers are scientific reports on selected, theme-based aspects of the drugs phenomenon. The series makes available the results of research carried out by the agency and its partners to a target audience of specialists and practitioners in the drugs field, including scientists, academics and policymakers.

Cataloguing data

European Monitoring Centre for Drugs and Drug Addiction
Drug-related research in Europe: recent developments and future perspectives
Luxembourg: Publications Office of the European Union
2012 — 23 pp. — 21 x 29.7 cm
ISBN 978-92-9168-503-5
doi: 10.2810/52705

TD-XA-12-002-EN-N