# Attitudes and behavior among young and healthcare providers regarding emergency contraception in Salerno

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#### ABSTRACT

The aim of the study was to evaluate the knowledge and use of emergency contraception (EC) among young, the attitude of midwives towards EC, the organization and hospitality of structures that prescribe EC in the province of Salerno. Potential user of EC (539 young women attending university and 309 young girls attending high school) and 70 midwives were enrolled, sixteen public structures able to dispense EC prescriptions were analysed. Anonymous questionnaire were administered to assess knowledge and use of contraception and EC of students, personal opinion on EC of midwives. Care facilities were evaluated in terms of accessibility, efficiency and ability to interact with users searching contraception. Social platforms are the privileged source of information and a large gap between the knowledge of contraception and the use of contraception was found. A general positive attitude of midwives towards EC was found together with the perception of a lack of diffusion of contraception among women. The analysis of the structures showed often the presence of a professional specifically dedicated to the "reception phase", although the medical attitude proved unfriendly in 2/3 of the cases. In the province of Salerno, a strong contrast is observed between the misinformation of young people about contraception and their need for answers that health public facilities are not able to offer. Health facilities and spaces available for counselling young people as regards both contraception and EC are lacking and the awareness of "non objector" professionals is low. The midwife, thanks to the great capacity for empathy, should be the professional who welcomes the young patient looking for information on sexuality and contraception.

#### **SOMMARIO**

Scopo di questa indagine conoscitiva è comprendere le problematiche relative all'utilizzo della contraccezione d'emergenza (CE), lo stato di conoscenza ed utilizzo tra le giovani, l'atteggiamento delle ostetriche, l'organizzazione e l'accoglienza delle strutture sanitarie deputate alla prescrizione. Lo studio ha coinvolto le potenziali di CE (539 studentesse universitarie e 309 di scuola superiore), 70 ostetriche, 16 strutture pubbliche. Attraverso questionari anonimi sono stati indagati la conoscenza e l'utilizzo della CE tra le studentesse e l'opinione personale delle ostetriche, le strutture assistenziali sono state valutate in termini di accessibilità, efficienza e capacità di relazione con l'utenza in rapporto alla contraccezione. Le piattaforme sociali sono la fonte preferenziale di informazioni per le giovani che mostrano un gap molto ampio tra la conoscenza e l'uso reale della contraccezione. Le ostetriche mostrano una generale attitudine positiva verso la CE insieme alla percezione di una scarsa diffusione tra le donne dei metodi contraccettivi. L'analisi delle strutture ha evidenziato spesso la presenza di una figura professionale specificamente dedicata alla "fase di accoglienza", ma l'atteggiamento medico si è rivelato nel 2/3 dei casi poco disponibile. Nella provincia di Salerno è evidente un forte contrasto tra la disinformazione delle giovani sulla contraccezione e l'esigenza di ricercare risposte che non ritengono fornite nelle strutture sanitarie territoriali. In tal senso appare fondamentale l'implementazione di servizi dedicati, come spazi- adolescenti o sportelli contraccezione, e del personale non obiettore. L'ostetrica, per la sua naturale inclinazione all'empatia, dovrebbe la figura professionale specificamente dedicata all'accoglienza con la giovane paziente alla ricerca di informazioni su sessualità e contraccezione.

Keywords: emergency contraception

# **INTRODUCTION**

Unwanted pregnancies remain a public health problem worldwide, despite the wide range of contraceptive options available<sup>(1)</sup>. World-wide in 2008 the cumulative unwanted pregnancy rate was 41% (83 million out of 208 million pregnancies): 20% ended in voluntary termination of pregnancy, 5% in spontaneous abortion and only 16% in term pregnancies. These data show a trend of increase through years: in 2012, out of 213 million of pregnancies, 40% (85 millions) were unwanted: among them, 50% ended in voluntary termination of pregnancy, 13% in spontaneous abortion and 37% in term unplanned pregnancies<sup>(2)</sup>. In Italy data

Correspondence to: pasquale.defranciscis@unina2.it Copyright 2015, Partner-Graf srl, Prato DOI: 10.14660/2385-0868-28 from Ministry of Health showed a progressive but slow reduction of voluntary termination of pregnancy from 234.801 in 1982 (highest incidence) to 107.192 in 2012, with a decrease of 3.8% compared to 2011<sup>(3)</sup>. Voluntary termination of pregnancy among teenagers, although low (3.4% out of all surgical procedures in 2011), shows a relative constant increase through the years<sup>(2)</sup>.

Emergency contraception (EC), or post-coital contraception, refers to methods of contraception that can be used to prevent pregnancy in the first few days after intercourse. It is intended for emergency use following unprotected intercourse, contraceptive failure or incorrect use, such as incorrect use of condom or breakage, rape or coerced sex. It needs to be taken as soon as possible to obtain the maximum effectiveness, and its use should be sporadic. A high percentage of voluntary termination of pregnancy could be avoided if EC was more widespread and available. Now days, EC is strongly recommended to be offered as part of their routine services within family planning programs thorough encrypted channels, carefully included in an informative, educational and communicative system<sup>(4)</sup>. It is more and more recommended by international organization to prevent unwanted pregnancies and limit dramatic consequences on women and couples<sup>(5)</sup>.

The problem of EC is the little or even no knowledge and also the neutral or negative attitude of both health workers and women<sup>(6)</sup>, as shown in several studies<sup>(7-9)</sup>. In this regard, the results of some studies indicated a relationship between using the EC with the knowledge and awareness of health care personnel and the women<sup>(10, 11)</sup>. In this scenario, health care workers, especially midwives, have a relevant role since they are the first professionals with the first contact with the woman searching contraception and therefore are key to effective access to EC; furthermore, midwives particularly play a significant role in the provision of reproductive health care to adolescents, therefore their attitudes about the use of EC among teens may impact the availability of emergency contraception options to these clients.

In Italy EC is available from year 2000. Although it is licensed for sale and recognized as safe and effective as "contraceptive method", its use is still limited compared with potential. To understand the issues related to the low use of EC, we performed a survey in the province of Salerno to evaluate: the state of knowledge and use of EC among young, the attitude of midwives towards EC, organization and hospitality of structures that prescribe EC.

# MATERIAL AND METHODS

We enrolled in an observational study lasting 12 moths: 848 potential user of EC (539 young women attending university of Salerno aged 18-29 years and 309 young girls attending high school aged 13-18 years) and 70 midwives working in hospitals, private clinics, family counselling clinics. Moreover, sixteen public structures able to dispense EC prescriptions were analysed: 12 family counselling clinics (Salerno Via Vernieri, Salerno Pastena, Nocera Inferiore, Cava dei Tirreni, Baronissi, Pontecagnano, Faiano, Eboli, Battipaglia, Capaccio Scalo, Sapri, Sala Consilina, Omignano Scalo/Vallo della Lucania); 4 basic medical services (Nocera Inferiore, San Marzano sul Sarno, Sarno, Sant'Egidio del Monte Albino).

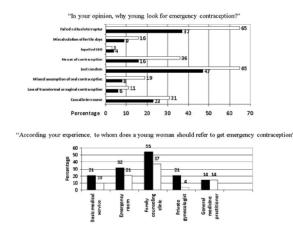
Students were interviewed by means of anonymous questionnaire with 28 questions (5 about general information, 14 about knowledge and use of contraception, 9 about knowledge and use of EC). Questionnaires were administered directly, on line (by means of private chat on Facebook platform "ad amici di amici" or by email) or through interview on informatics platform. Midwives were interviewed by means of anonymous questionnaire with 26 questions (5 about general information, 8 about personal opinion on EC, 6 about factors associated with EC, 6 about organization of health facilities where they actually work or worked).

Care facilities were evaluated in terms of accessibility, efficiency and ability to interact with users searching contraception. The following parameters were evaluated for the "reception phase": midwife present at time of access (yes or not), attitude of midwife (score from 1 to 3 according to unfriendly, friendly, very friendly), mode of counselling (score from 1 to 3 according to unsatisfactory, satisfactory, very satisfying); the following parameters were evaluated for the "hospitality phase": registration of visit, performing clinical history, measuring blood pressure, prescribing laboratory tests, prescribing beta-hCG, performing gynaecological examination, prescribing contraception, proposing next gynaecological visit and ultrasonography with Pap-test, payment of ticket for the visit.

# RESULTS

# Potential user of EC

As regards knowledge of contraceptive methods, there were no differences between the university students and the high school students. The preferential sources of information for young students were "Internet" and "peer": 71% out of 309 surveyed high school girls confront friends, 48% look for answers in the websites, 30% consult newspapers and magazines. As regards university students, the preferred source of information is the word of mouth among friends (57%), followed by newspapers and magazines (48%), then internet (45%). Conversely, as regards the role of school and teachers only 26% of students attending high school and 28% of university students claims to have received lessons in sex education in the classroom. It is not difficult to deduce how this kind of behaviour does not increase the knowledge and awareness of young people, rather tends to create more confusion, since it is simply an horizontal information peer Web, without any scientific feature. It is remarkable to note that social platforms like Facebook, blogs and forums are the privileged places. As regards knowledge of EC (Figure 1), 66% of high school students and 93% of university declares to know the real meaning ("use of pharmacological and mechanical methods after unprotected sex"), is aware of the administration methods ("as soon as possible": 96% of university and 86% of high school students), the need for medical prescription to buy the drugs (88% of university and 63% of high school students), the places of prescription (the majority believes to refer to the counselling centre and to the hospital emergency room).



#### Figure 1

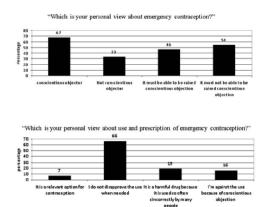
Knowledge and personal experience of emergency contraception among potential users (university students: black square, high school students: white square).

As regards EC personal use, there is a very large gap between the knowledge and the actual use of contraception. In fact, most of the surveyed university students (84%) use condoms and most of high school students (66%) use coitus interruptus, only 25% of universities and 4% of high school students use oral estroprogestin; 9% of high school students and 27% of universities claim to have made use of the EC. As regards sexual experience, 70% of universities versus 46% of high school students has a stable relationship. No difference was found as regards age of first sexual intercourse: 3% begins sexual activity between 12 and 14 years old, 40% between 15 and 18, 36% between 19 and 25, 1% after 25 years old, 13% report have not yet had sexual relations after 25 years old.

#### Midwives

As regards conscientious objection (**Figure 2**), 54% believes that the right to conscientious objection should not be raised against EC, even though 67% declared conscientious objector and 66% is not clearly favourable to EC and claims not disapprove of its use "if done sensibly … rarely and in case of real need". Beyond the personal position towards the EC, the main problem according midwives surveyed is the lack of diffusion of contraception in general among women.

The picture of the situation does not differ from reality emerged from the data of the survey conducted on the student population. As regards counselling about CE, 83% of midwives work in a hospital facilities where EC is prescribes and in which the professional dedicated to reception is the midwife (31%), the physician (10%), midwife and7or physician (10%), nurse and/or midwife and/or physician (5%), not identified (51%). "Reception phase" and "hospitality phase" are managed by physician (39%), midwife (33%), either from your physician or midwife or nurse (28%). As regards the quality of EC service offered by the structures in the Salerno area, 57% of midwives considers that the service is improvable, particularly as regards increasing the number of facilities able to prescribe EC.



**Figure 2** Midwives' opinion about emergency contraception.

#### **Health facilities**

It is worth noting that 57% of the girls interviewed do not consider the public health facilities the best place where they can find answers to their needs of contraception. As regards "Reception phase" (**Table 1**), the analysis of the structures showed in 8 out of 12 cases the presence of a professional specifically dedicated to the "reception phase", which is able to pay particular attention to the psycho-emotional support and to "listening" in the majority of cases (6 of 8).

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The medical attitude proved unfriendly in 2/3 of the cases, mostly when the nurse was the first professional facing with patient; only in 4 out of 12 structures a contraception counselling adequate for time and clarity with respect to different contraceptive options was performed. As regards "Clinical work-up and prescription" (Table 1), family clinics appear to show a behaviour consistent with that provided by the guidelines.

In all of the structures an essential medical history collection was performed, although it was particularly thorough only in three of them. No structure performed laboratory tests before EC prescription, in only one case gynaecological examination was requested. In four facilities the drug was not prescribed because nor the GP or the gynaecologist or doctor's prescription was lacking. The ticket for medical visit was never

#### Table 1

"Hospitality phas	se" of twelve	counselling clinics.
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Midwife present at reception	Yes	Yes	Yes	No, physician	No, physician	Yes	Yes	No, nurse	Yes	No, physician	Yes	Yes
Attitude of midwives*	2	3	3	1	3	3	3	1	2	2	3	3
Mode of counselling**	1	1	3	1	3	3	3	1	1	1	1	1
Registration of visit, performing clinical history	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Measurement of blood pressure	Yes	No	No	No	No	No	No	No	No	No	No	No
Prescription of laboratory tests	No	No	No	No	No	No	No	No	No	No	No	No
Prescription of β-hCG	No	No	No	No	No	No	No	No	No	No	No	No
Performing gynaecological	No	No	No	No	No	No	Yes	No	No	No	No	No
Prescription of contraceptive method	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	No	No	No	Yes
Prescription of laboratory tests	No	No	No	No	Yes	Yes	No	No	No	No	No	No
Proposal of next gynaecological visit, ultrasonography and pap-test	No	No	Yes	No	No	Yes	Yes	No	No	No	No	No
Payment of ticket	No	No	No	No	No	No	No	No	No	No	No	No

\*attitude of midwife: score from 1 to 3 according to unfriendly, friendly, very friendly

\*\*mode of counselling (score from 1 to 3 according to unsatisfactory, satisfactory, very satisfying).

requested, a further medical consultation was never recommended. The attitude of the basic medical services was quite different, because the prescription of EC was rejected by the physicians.

# DISCUSSION

Successful use of EC requires accurate knowledge of and favourable attitude towards

EC methods<sup>(12)</sup>. Despite young present themselves strong in their convictions and capable of living sexuality, many of them seem to live their sexuality in a not fully aware way: it's clear the a strong contrast between the use of inefficient contraceptive methods and misinformation, on the other part the need to look for answers that the do not believe to be provided in health facilities across territorial facilities. Most of the young people surveyed do not consider the available health facilities a reference point to their needs for sexual and reproductive health: therefore it's mandatory to rethink the organization of local health services targeted to meet the needs of such young patients users. It's noteworthy that the actual use of safe contraception appears to be low compared to deepen knowledge about contraceptive methods: the reasons of poor use of hormonal contraception are obviously different from the lack of knowledge, and should be investigated if its spread should be promoted. One would imagine a high utilization of the EC in relation to the high failure rate of contraceptive methods routinely used (condom, coitus interruptus), as stated by most girls. In this regard there is need of educational projects and campaigns both with direct interventions in schools and youth associations, but mostly through dedicated websites supervised by scientists. Our data show the need for greater awareness of the obstetricians and physician to the need to provide complete and comprehensive the EC, which currently needs a better receptive and hospitality phase. The latter is the most delicate and cannot ignore the protection of the health of the psycho-emotional woman, worried about the risk of a possible unwanted pregnancy and the related consequences, but also for the expectation of solving the problem (i.e. prescription of EC).

Data show that health facilities manage the reception phase in an unsatisfactory without establishing a real relationship that puts the woman at the centre of care. The reason is probably the frequent lack of midwife during the reception phase. This is all the more serious in view of a teenager, which probably approaches the first time to a health facility and expects a greater capacity for empathy. In this view, it is fundamental to implement special services such as "space teenagers" or "points of contraception" that could satisfy, through trained and dedicated professionals, even in times outside of those canonical office that clash with the routine school activities, their legitimate expectations of response to the questions of sexuality and contraception

The EC is a central aid of contraception, allowing women of different age groups to fully enjoy their life as a couple, not to feel panicked for anxiety of having made irreparable mistakes, as a result of a not adequately protected intercourse. The EC also could allow to repair the point of disconnect between voluntary termination of pregnancy and failure of usual contraception. The request for EC could also represent an opportunity to encourage the woman and couple to rely on care facilities, particularly territorial ones, without the fear of having to be judged, for subsequent moments of reflection that will allow to address the issue of prevention contraceptive.

The EC is still poorly accepted by a large part of health care professionals and the general public who continue to consider it an abortion procedure and opt for a controversial conscientious objection. It's well known that the use of the EC depends on many factors: functioning of health facilities devoted to the prescription, the sensitivity of health workers, the information received from potential users are absolutely relevant<sup>(13)</sup>. Moreover, it is proven that information campaigns targeted to users (such as educational interventions in schools and advertising campaigns promoted by scientific societies), spaces dedicated to listening and consulting in territorial medicine (such as spaces "teenager" available in some counselling centres), awareness of professionals (such as specific training courses), may significantly increase the demand for EC prescription and the compliance to long-term contraceptive programmes.

In conclusion, the results of this research in the province of Salerno showed among young adequate knowledge but misuse of contraception, a positive attitudes of health workers about the some aspects of EC method, the lack of adequate health facilities and spaces available for counselling young people as regards both contraception and EC. It feels the need for territorial medicine which may offer both convenient times and spaces for teenagers, and "non objector" professional willing to listen, to education and prescription.

### **DECLARATION OF INTEREST**

The Authors have no financial affiliation (e.g., employment, direct payments, stock holdings, retainers, consultantship, patient-licensing arrangements, or honoraria) or involvement with any commercial organization with direct financial interest in the subject or material discussed in this manuscript. The Authors have no financial interest in any aspect of the work and did not receive any financial support. Any other potential conflict of interest also is disclosed. It. J. Gynaecol. Obstet. 2015, 27: N.4 DOI: 10.14660/2385-0868-28

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