

## Knowledge of Paramedical Staff Regarding Drugs Addiction in Baghdad City/ Iraq

معارف ذوي المهن الصحية حول إدمان المخدرات في مدينة بغداد / العراق

Shymaa. H. Najm, MSc\*

Atta. Abd Al- Hussein Mousa, PhD \*\*

\* Technical Trainer, Middle Technical University, College of Health and Medical Technologies of Baghdad , Email: [shymaahadi1@gmail.com](mailto:shymaahadi1@gmail.com)

\*\*Professor, Community Health Department, Middle Technical University, College of Health and Medical Technologies of Baghdad, Email: [Atta. Abd Al- Hussein@gmail.com](mailto:Atta. Abd Al- Hussein@gmail.com)

### الخلاصة:

**الهدف:** تهدف الدراسة لتحديد مستوى المعرفة فيما يتعلق بإدمان المخدرات بين الموظفين الطبيين ؛ وتحديد العلاقة بين مستوى المعرفة والمتغير الاجتماعي الديموغرافي.

**المنهجية:** أجريت دراسة وصفية مقطعية في مدينة بغداد على الكوادر الصحية للفترة من ١/ حزيران/ ٢٠١٦ إلى ٣٠ / ايلول/ ٢٠١٦. وشملت عينة الدراسة ٥١٠ من ذوي المهن الصحية هناك ٩ قطاعات في وسط بغداد ، ٥ منها في جانب الكرخ من المدينة و ٤ في جانب الرصافة. وقد تم اختيار العينة من ٤٩ مركز للرعاية الصحية الأولية و ٨ مستشفيات عامة عن طريق عينة متعددة المراحل بتقنية العينة العشوائية البسيطة. جمعت المعلومات من خلال تصميم استبانة تم تحديد عملية ثباتها وصدقها. عملية تحليل البيانات تمت باستخدام أساليب الإحصاء الوصفي المنوي والاستدلالي .

**النتائج:** أظهرت نتائج الدراسة إلى أن حوالي (٢١،٨%) من الكوادر الصحية في المرحلة العمرية (٤٠-٤٤) وكانت الغالبية العظمى من عينة الدراسة للذكور بنسبة (٥١،٢%) و حوالي (٧١،٨%) من المتزوجين في حين إن الغالبية (٨٧،١%) من سكان المدينة. أما المستوى التعليمي كانت الغالبية من خريجي المعاهد الطبية بنسبة (٦٢،٤%). لا يوجد ارتباط كبير بين الجنس، الحالة الزوجية، موقع السكن والمعارف حول إدمان المخدرات لدى ذوي المهن الصحية .

**التوصيات:** أوصيت الدراسة بأنه الموظفون الطبيون يحتاجون إلى الالتزام بالبرامج التعليمية والتدريب الوطني كدورات مكثفة لفترات قصيرة و برامج تثقيفية وطنية حول إدمان المخدرات لمنع انتشار هذه المواد بين الناس.

**مفتاح الكلمات:** المعرفة وإدمان المخدرات الكوادر الصحية.

### Abstract:

**Objectives:** To determine the level of knowledge regarding drugs addiction among paramedical staff; and to identify the association between the level of knowledge and their socio-demographic variable.

**Methodology:** A cross-sectional study was Conducted in Baghdad on Staff for the period from 1<sup>st</sup> June, 2016 to 30<sup>th</sup> September, 2016 . The sample included 510 Health professionals . There are 9 sectors in center of Baghdad , 5 of them in Al- Kurkh side of the city and 4 in Al-Russafa side. The sample was selected from 49 primary health care centers and 8 public hospitals through a multi-stage sample using a simple random sampling technique. The information was collected through the design of a questionnaire whose stability and reliability were determined. Data analysis was done using descriptive and indicative descriptive statistical methods.

**Results:** The results of the examination demonstrated that 21.8% of the health staff in the age group (40-44) were the majority of the study sample for males (51.2%) and about (85.9%) of the married while the majority (87.1% Of the city's population. The educational level was the majority of graduates of medical institutes (62.4%). No significant association was found between level of education and knowledge about drug addiction for paramedical staff .No significant association had been found between gender, marital status, and residence with knowledge about drug addiction for paramedical staff.

**Recommendations:** Paramedical staff might be needed to adhere to educational programs and national training as intensive courses for short period, about of drug addiction. And national education programs about drug addiction to prevent constructed and presented to the public through the collaboration between the health authority and society association and non-governmental organizations.

**Key words:** Knowledge, Drug Addiction, Paramedical Staff.

**Introduction:**

**E**nslavement is characterized as a perpetual, backsliding mind infection that is described by urgent medication chasing and use, in spite of destructive outcomes. It is viewed as a mind ailment since drugs change the cerebrum; they change its structure and how it functions. These cerebrum changes can be enduring and can prompt numerous hurtful, frequently reckless, practices<sup>(1)</sup>. Addiction is an important community health problem and it causes significant morbidity and mortality, especially in the young teens and greatest risk groups<sup>(2)</sup>. The habit investigate group should be emphatically mindful of the challenges which are frequently countered in leading such research in creating nation settings. In this article of report from Afghanistan and distinguish a portion of the expansive inquiries to which it gives rise<sup>(3)</sup>. Reliance or habit is a sort of behavioral wonders in which substance utilize takes need than different practices<sup>(4)</sup>. Medication mishandles and dependence has turned out to be a standout amongst the most critical general medical issues as of late. Data giving part of lay hypotheses is verifiable in preventive and rehabilitative works identified with medicate dependence. A few examinations explored lay convictions and states of mind identified with various types of medications<sup>(5)</sup>. Studies take note of that age scope of addicts and medication abusers has diminished internationally. This diminished age extend has imperiled numerous

teenagers and youngsters and has brought broad worry up in social orders. Along these lines, evading the issue of medication mishandle has hindering results for each general public, for example, decimation of social and monetary assets, risk to government managed savings, and different types of maladaptive practices<sup>(6)</sup>. The problem is affecting both the developed and the developing countries. In many industrialized countries, as the United States of America, Canada and the European Union the abuse of one substance or another ranged from 2% to 20%<sup>(7:8)</sup>. The Middle East Countries also affected, as it's a transit area for the world illicit drugs, with many countries experiencing rapid social<sup>(9)</sup>. In Iran, drug addiction have raised following 2003 war, which was driven by many factors, as violence, economic strain, social and religious conflicts<sup>(10)</sup>. In Iraq those attending hospital emergency departments have drug addiction-related injury/illness and present in a state of clinical intoxication. Health care professionals working in emergency departments are frequently exposed to patients with substance use problems and are in ideal positions to provide early diagnosis and treatment<sup>(11)</sup>. International studies that focus on primary care and addiction within the mental health sector suggest that health care professionals' knowledge regarding drug addiction. There is a dearth of empirical research, internationally, and particularly in Iraq, Ireland, Iran, India that addresses

health care professionals' knowledge in relation to substance use and substance users with no empirical evidence to ascertain in particular, emergency department doctors' and nurses' knowledge )<sup>(12 ; 13)</sup>.

#### Methodology:

Across sectional study conducted in Baghdad City. On the paramedical staff for the period from 1<sup>st</sup> June to 30<sup>th</sup> September, 2016 . The sample of study included 510 paramedical staff in primary health care centers and general hospitals have been chosen sample. There are 9 sectors in center of Baghdad , 5 of them in Al- Kurkh side of the city and 4 in Al-Russafa side. The sample was selected from 49 primary health care center and 8

#### Results:

general hospitals by a multi-stage simple random sampling, The first stage of selection was – hospitals and health care sectors selection, the hospitals and health care sectors were labeled and selected (from list of hospitals and list of health sectors) by simple random sampling for both separately. In the second stage of selection – primary health care centers from health sectors selection were labeled and selected (from list of primary health care centers) by simple random sampling. Analysis of data was carried out using the available statistical package of SPSS-22 (Statistical Packages for Social Sciences–Version)

**Table (1): Distribution of Studied Sample According to Age, Gender, Marital Status, Residence and Educational Level**

Variables		F	%
Age (years)	<30	66	12.9
	30---34	70	13.7
	35---39	96	18.8
	40---44	111	21.8
	45---49	62	12.2
	=>50	105	20.6
	Mean± SD (Range)	40.2±9.2(18-63)	
Gender	Male	261	51.2
	Female	249	48.8
Marital status	Unmarried	72	14.1
	Married	438	85.9
Residence	Urban	444	87.1
	Rural	66	12.9
Educational level	Secondary	80	15.6
	Medical institute	318	62.4
	College & Higher	112	22.0

Freq =Frequency; % =percentage

**Table (1)** shows the distribution of the paramedical staff according to age, gender and marital status, residence and educational level . The mean  $\pm$  SD of their ages was  $40.2 \pm 9.2$  a long time, the age extend at the season of study was between (18-63). (male: female proportion was 1.04:1) The most noteworthy rate (21.8%) were in the age group (20-29) years and the lowest percentage (12.2%) were in the age group (45-49) . Regarding marital status the highest percentage (85.9%) were married . While the lowest percentage for unmarried (14.1%) . More to the studied sample (87.1%) from urban area . Regarding educational level highest percentage (62.4%) from medical institute. And lowest percentage from secondary school.

**Table (2): Distribution of Studied Sample According to Their Knowledge about Means and Methods of Drug Addiction**

Item	Yes		NO		Don't know	
	F	%	F	%	F	%
Cigarette	481	94.3	21	4.1	8	1.6
Chewing	358	70.2	57	11.2	95	18.6
Tablet	466	91.4	39	7.6	5	1.0
Patch	226	44.3	108	21.2	176	34.5
Powder	388	76.1	71	13.9	51	10.0
Drinking liquid	399	78.2	72	14.1	39	7.6
Transparent crystal	201	39.4	149	29.2	160	31.4
Injection	450	88.2	31	6.1	29	5.7
Inhalable vapor of some liquids	431	84.5	41	8.0	38	7.5

Freq =Frequency; % =percentage

This table reveals that higher percentage of studied sample answered correctly (94.3%) ,(91.4%) for Cigarette, and tablet responding while. the lower percentage for (39.4%) for (Transparent crystal).

**Table (3): Distribution of Studied Sample According to Their Knowledge about the Following Addictive Material**

Item	Yes		NO		Don't know	
	F	%	F	%	F	%
Sleeping pills	502	98.4	1	0.2	7	1.4
Hashish	470	92.2	33	6.5	7	1.4
Analgesics	218	42.7	260	51.0	32	6.3
Antibiotics	149	29.2	311	61.0	50	9.8
Shisheh	430	84.3	38	7.5	42	8.2
Morphine	442	86.7	39	7.6	29	5.7
Heroin	450	88.2	38	7.5	22	4.3
Volatile solvents	392	76.9	53	10.4	65	12.7
Cocaine	453	88.8	37	7.3	20	3.9
Opium	431	84.5	40	7.8	39	7.6
Some drugs that contain sedatives	450	88.2	30	5.9	30	5.9

Freq =Frequency; % =percentage

**Table (3)** indicates that the majority (98.4%) answered correctly about (Sleeping pills), while more than (92.2%) of studied sample answered correctly about (Hashish). while (88.8%) and (88.2%) of studied sample answered correctly about (Cocaine), (Heroin) and (Some drugs that contain sedatives). while (86.7%), (84.5%) and (84.3%) of studied sample answered correctly about (Morphine), (Opium) and (Shisheh). while (76.9%) of studied sample answered correctly about (Volatile solvents).

**Table (4 ) : Distribution of Studied Sample According to Their Knowledge about the Reasons for the Rush to Drugs**

Item	Yes		NO		Don't know	
	F	%	F	%	F	%
Bad friends	503	98.6	4	0.8	3	0.6
Disintegration of the family	469	92.0	37	7.3	4	0.8
Curiosity and experience	425	83.3	55	10.8	30	5.9
Luxury and excessive abundance of money	411	80.6	67	13.1	32	6.3
Filling spare time	431	84.5	46	9.0	33	6.5
Unemployment	442	86.7	46	9.0	22	4.3
Escape from the face of problems	450	88.2	38	7.5	21	4.1
Resorting to some soothing medicine without consulting your doctor	444	87.1	45	8.8	22	4.3
The misconception that the drug increases the sexual ability	234	45.9	196	38.4	80	15.7
The desire to increase the ability to work	201	39.4	227	44.5	82	16.1
The weakness of religious faith	468	91.8	31	6.1	11	2.2
The volatile security situation (such as displacement	296	58.0	70	13.7	144	28.2
Disability in the body	287	56.3	79	15.5	144	28.2
Lack of services	207	40.6	171	33.5	132	25.9

Freq =Frequency; % =percentage

**Table (4 )** Shows that the Percentage (98.6%) of sample answered correctly about (Bad friends), while more than (92.0%) and (91.8%) of studied sample answered correctly about (Disintegration of the family) and (The weakness of religious faith). while (88.2%) and (87.1%) of studied sample answered correctly about (Escape from the face of problems ) and (Resorting to some soothing medicine without consulting your doctor) .while (86.7%) and (84.5% ) of studied sample answered correctly about (Unemployment ) and (Filling spare time) .while (83.3%) and (80.6%) of studied sample answered correctly about (Curiosity and experience) and (Luxury and excessive abundance of money) .while (58.0%) and (56.3%) of studied sample answered correctly about (The volatile security situation (such as

displacement ) and (Disability in the body ). while (45.9%) and (40.6%) of studied sample answered correctly about (The misconception that the drug increases the sexual ability) and (Lack of services) ). while (39.4%) of studied sample answered correctly about (The desire to increase the ability to work).

**Table (5) : Distribution of Studied Sample According to Their Knowledge about the Complication of Drug Addiction**

Item	Yes		NO		Don't know	
	F	%	F	%	F	%
Psychological and mental health problems	486	95.3	10	2.0	14	2.7
Loss of consciousness, coma .	451	88.4	40	7.8	19	3.7
Sudden death	471	92.4	31	6.1	8	1.6
Infectious diseases such as HIV and hepatitis	405	79.4	43	8.4	62	12.2
Exposure to accidents	457	89.6	36	7.1	17	3.3
Suicide	469	92.0	34	6.7	7	1.4
Family problems, marital disputes	465	91.2	32	6.3	13	2.5
Legal issues	439	86.1	38	7.5	33	6.5
Financial problems	449	88.0	35	6.9	26	5.1

Freq =Frequency; % =percentage

**Table(6): Distribution of Studied Sample According to Their Knowledge about Preventive Measures of Drug Addiction.**

Item	Yes		NO		Don't know	
	F	%	F	%	F	%
Is addiction prevented or not ?	487	95.5	6	1.2	17	3.3
Community leaders and clerics, intellectuals role in eliminating the scourge of addiction	465	91.2	37	7.3	8	1.6
Media as well as the role of civil society organizations in the elimination of the scourge of addiction?	460	90.2	35	6.9	15	2.9
Supreme National Commission for anti-drug role in the fight against drugs in Iraq?	424	83.1	55	10.8	31	6.1

Health education plays an essential part in the anticipation of enslavement?	463	90.8	35	6.9	12	2.4
Promotion of religious faith .	467	91.6	32	6.3	11	2.2
Activate the oversight and guiding role of the father within the family.	466	91.4	32	6.3	12	2.4
Lack of awareness of adolescents and young people on the subject of drugs do not even curious to try it out.	434	85.1	59	11.6	17	3.3
Parenting Islamic education .	470	92.2	27	5.3	13	2.5
stop children and adolescents from traveling alone .	480	94.1	19	3.7	11	2.2
Encourage children to talk freely with parents	452	88.6	47	9.2	11	2.2
Enough cautionary statement about the effects of smoking on cigarette packs without the need for further action to put in order not to interfere in the personal freedom of individuals?	217	42.6	254	49.9	38	7.5

Freq =Frequency; % =percentage

Results that highest percentage of studied sample answered correctly about (Addiction is preventable habit (95.5% ) . while the lowest percentage (42.6%) of studied sample answered correctly about (Enough cautionary statement about the effects of smoking on cigarette packs without the need for further action to put in order not to interfere in the personal freedom of individuals ).

**Table ( 7 ) : Distribution of Studied Sample According to Knowledge Score about Drug Addiction by Gender, Marital Status, Residence and Education Level .**

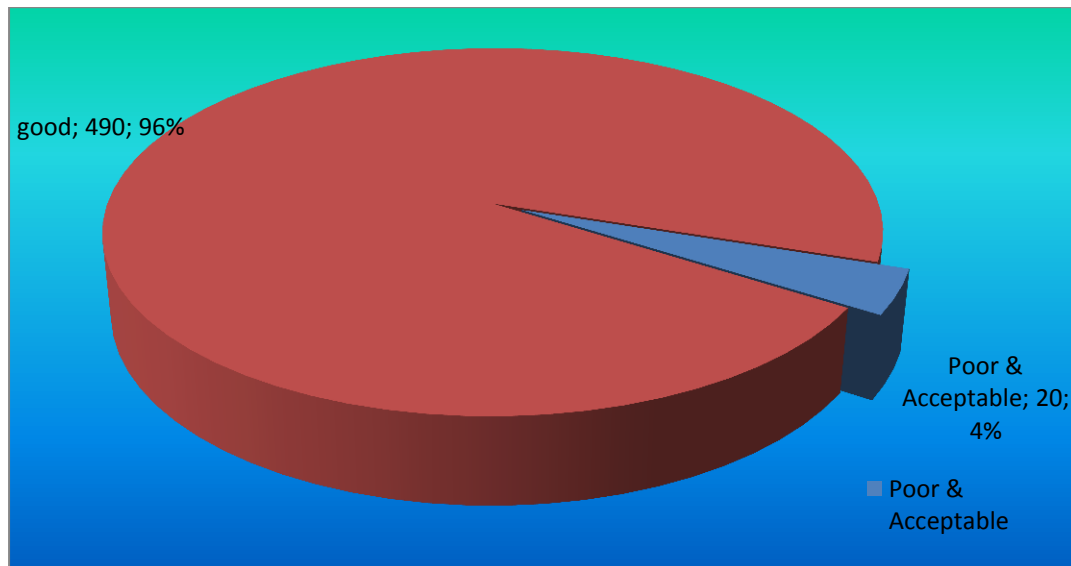
Variables		Poor & Acceptable		Good		
		F	%	F	%	p.value
Gender	Male	10	50.00	251	51.22	p.v=0.914 $\chi^2=0.012$ df=1
	Female	10	50.00	239	48.78	
	Total	20	100.00	490	100	
Marital status	Unmarried	4	20.00	68	13.88	p.v=0.3 $\chi^2=0.20$



	Married	16	80.00	422	86.12	df=1
	Total	20	100.00	490	100	
Residence	Urban	17	85.00	427	87.14	p.v=0.780
	Rural	3	15.00	63	12.86	$\chi^2=0.078$ df=1
	Total	20	100.00	490	100	
Educational	Secondary	3	15.00	77	15.71	p.v=0.719
	Medical institute	14	70.00	304	62.04	$\chi^2=0.661$
	College & Higher	3	15.00	109	22.24	df=2
	Total	20	100.00	490	100	510

Freq =Frequency; % =percentage

The results of this table show that (51.22%) of male and (48.78%) of females . while about marital status ( 86.12%) of married, while regarding residence (87.14%) of urban. While regarding educational level (62.04%)of medical institute.



**Figure (1): The Knowledge Score of Drug Addiction among Paramedical Staff.**

The higher percentage more than 90% had good score while lower percentage had poor score ( Figure 1).

**Discussion:** Many studies have inspected the several level of Knowledge about drug addiction, for substance abuse and addiction<sup>(14)</sup>. To the best of our insight, this is the primary examination tending to the Knowledge paramedical staff with respect to medicate enslavement in Baghdad city. There is no similar previous study on knowledge of paramedical staff about drug addiction however the comparison was carried out with other studies on students' knowledge on drug addiction. This part manages a deliberate translation of the present examination discoveries and talk of different aspects of results for paramedical staff in the primary health care centers and hospitals. Several studies tried to identify the awareness, knowledge of the general population or college students regarding pandemic substance abuse and addiction<sup>(15)</sup>. **Age groups :** Mean  $\pm$  SD of their ages was (40.2 $\pm$ 9.2) years, the age range at the time of study was between (18-63). The findings of the present study supportive evidence is available in the study that showed (the high percentage of their sample, 75% at the age (18-60) years)<sup>(17)</sup> and the findings of the present study this result differs from (18-45) years. (It is slightly higher than age range in other reported study in Germany was 18-45 due to in Germany the health statement of hospital and health center is better than Iraq because of Socio-economic and demographic characteristics in Iraq).<sup>(16)</sup>

**Gender:** Regarding the data of the present study showed that half sample who answered with substance abuse

were male during the period of conducting the study. The findings of the present study supportive evidence is available in the study that showed (the high percentage of their sample were male, 55%)<sup>(18)</sup>, because the socio-economic resonance.

**Marital status:** Regarding the marital status of the sample the result indicated that (85.9%) of the sample are married. The findings of the present study supportive evidence is available in the study that showed (the high percentage of their sample were married, 85%)<sup>(19,20)</sup>.

**Residence and educational levels:** Regarding the residence the highest percentage of studied sample were from urban area (87.1), The findings of the present study supportive evidence is available in the study that showed (highest percentage of samples 80% are urban areas)<sup>(21, 22)</sup>.

**Health institution (place of work) :** About more than (70%) of studied sample was working in primary health care centers while less than (30%) was working in hospitals. The findings of the present study supportive evidence is available in the study that showed (highest percentage of samples 70% was working in primary health care centers)<sup>(23)</sup>.

**Mode of taking of drug addiction:** Regarding modes of drug addiction, the majority answer correctly about cigarette (94.3%). The findings of the present study supportive evidence is available in the study that showed (good paramedical staff knowledge about mode of taking of cigarette)<sup>(24)</sup>.

Regarding the lowest percentage (39.4%) in (transparent crystal). The findings of the present study supportive evidence is available in the study that showed (poor paramedical staff knowledge about mode of taking of transparent crystal)<sup>(25)</sup>.

**Addictive material of drug addiction:** Regarding the addiction material the majority (98.4%) answered correctly about (Sleeping pills ). The findings of the present study supportive evidence is available in the study that showed (good paramedical staff knowledge about Addictive material of drug addiction about Sleeping pills (77%)<sup>(26,27)</sup>.

**Reasons of drug addiction:** Regarding the reasons of drug addiction the majority (98.6%) from (bad friends). The findings of the present study supportive evidence is available in the study that showed (good paramedical staff knowledge about Reasons of drug addiction about bad friends)<sup>(28)</sup>. The lowest percentage (39.4%) from (The desire to increase the ability to work), the findings of the present study supportive evidence is available in the study that showed (poor paramedical staff knowledge about Reasons of drug addiction about The desire to increase the ability to work)<sup>(29)</sup>.

**Complication of drug addiction:** Regarding the complication of drug addiction the highest percentage of paramedical staff (95.3%) answered correctly about (Psychological and mental health problems). The findings of the present study supportive evidence is available in the study that

showed (the high percentage of their sample were Psychological and mental health problems, 95%)<sup>(30)</sup>. And lower percentage (79.4%) about (Irresistible illnesses, for example, HIV and hepatitis). The findings of the present study supportive evidence is available in the study that showed (the lower percentage about Irresistible illnesses, for example, HIV and hepatitis)<sup>(31)</sup>.

**Preventive measures of drug addiction :** Regarding the knowledge of paramedical staff about preventive measures of drug addiction, the higher percentage (95.5%) of paramedical staff answered correctly about (addiction prevented ), The findings of the present study supportive evidence is available in the study that showed (the high percentage of their sample were addiction prevented, 85%)<sup>(16)</sup>. Changes made in the medical education curricula led to challenges during the recent decades, to the therapeutic and paramedical training period is a genuine need. Creating consistent instruction programs for current social insurance staff are additionally prescribed. These discoveries could be valuable to plan and execute prove based instruction. Utilizing institutionalized dependence cases in view of these discoveries could be useful in Iraq. Information score about medication fixation: The majority (96.1 %) of studied sample had good knowledge score toward drug addiction . No similar studies reported in Iraq and The findings of the present study supportive evidence is available in the study that showed (good paramedical staff knowledge about Preventive measures)<sup>(32)</sup> , who found

the overall participant's knowledge about the meaning of addiction, mode of transmission and preventive measures to be excellent <sup>(10)</sup>, reported had "adequate knowledge". Health care workers had "good knowledge" <sup>(32)</sup>. Gender: the current study showed that non-significant association was found between knowledge score & demographical variables as gender of studied sample and their knowledge towards drug addiction, The findings of the present study supportive evidence is available in the study that showed (there was non-significant relationship between the knowledge score & demographical variables as gender of studied sample and their knowledge towards drug addiction) <sup>(33)</sup>. Education level: The present study showed that non-significant association was found between knowledge score & demographical variables as education level and their knowledge towards drug addiction about (Medical institute), the findings of the present study supportive evidence is available in the study that showed (there was non-significant relationship between the knowledge score & demographical variables as Education level of studied sample and their knowledge towards drug addiction) <sup>(34)</sup>. Marital status: The current study showed that non-significant association was found between knowledge score & demographical variables as marital status and their knowledge towards drug addiction about (married), the findings of the present study supportive evidence is available in the study that showed (there was non-significant relationship between the knowledge score & demographical

variables as marital status of studied sample and their knowledge towards drug addiction)<sup>(20)</sup>. Residence: The current study showed that non-significant association was found between knowledge score & demographical variables as residence and their knowledge towards drug addiction. And less than one quarter of rural area and more than three quarter of urban area, this result might be due to more than three quarter of studied sample was from urban, the findings of the present study supportive evidence is available in the study that showed (there was non-significant relationship between the knowledge score & demographical variables as Residence of studied sample and their knowledge towards drug addiction) <sup>(20)</sup>. He demonstrated that most of the respondents were lived in urban area. That perhaps due to the greater sampling was from the city center.

### Recommendations

- 1- Paramedical staff might be needed to adhere to educational programs and national training as intensive courses for short period, about of drug addiction.
- 2- National education programs about drug addiction to prevent constructed and presented to the public through the collaboration between the health authority and society association and non-governmental organizations.
- 3- Further studies among medical ,paramedical staff and patients are needed to assess the knowledge, attitude and practices about drug addiction.

- 4- Nurse managers first deal with their own personal stereotypes of addiction and nurses with a substance use disorder. They can develop and foster a climate of transparency and support for all nurses that will encourage nurses to break the code of silence.

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