

Emotional Regulation and Psychological Well-Being of Newcomer Nursing Students

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Abstract

Background: Emotion regulation is a term used to describe a person's capability to efficiently manage and respond to an emotional experience especially during time of stress. The analysis of how newcomer nursing students regulate their emotions and its' impact on their psychological wellbeing is a crucial important. **Aim:** assessed difficulties of emotional regulation and psychological well-being of newcomer nursing students, and discovered the relation between them. **Setting:** Faculty of Nursing, Tanta University in Tanta city, Egypt. **Subject:** 387 Newcomer nursing students at the first year academically of Faculty of Nursing. **Research design:** the present study has followed descriptive correlation design. **Tools:** two tools were used for data collection; tool one was Difficulties in Emotion Regulation Scale. Tool two was Ruff Psychological well- being Scale, in addition to socio-demographic data. **Result:** the current study showed that the newcomer nursing students had moderate levels of difficulties in emotional regulations and psychological well- being. There was a statically negative correlation between psychological well- being and difficulties of emotions regulation. **Conclusion:** more difficulties in regulating emotions leads to more decrease in students' psychological well - being. **Recommendation:** Educational training program should be prepare for learning and training new nursing students strategies to improve their emotional regulations, and well- being.

Keywords: Emotional regulation; psychological well-being; Newcomer Nursing Students.

Introduction

Emotions are a common part of everyday lives. It promotes worthwhile achievement, enables interpersonal engagement, and directs actions to improve wellbeing, but it is not always functionally adaptive. They may influence people to take a socially unacceptable or dangerous course of action, or they may cause a significant interpersonal bond to be broken (Verzeletti.C et al., 2016). Trying to regulate one's emotions is always a voluntary act, but it is important to respond appropriately to environmental stresses (KantanaM et al., 2019).

Professional nurses work with various patients and relatives, frequently in stresses or crises. They able to manage their emotions from moment to moment, while making clinical decisions during accomplishment patient care. Fitting management of their inconsistent emotions will enable professional nurses to effectively interconnect with and be supportive of patients and relatives. This finally helps to provide qualified nursing care (Gonnelli C. et al., 2016). Newcomer nursing students are not prepared to deal with the emotional pressures and struggles they face in the clinic. It is important for nursing students to focus on how they feel emotionally and control their emotions when caring

for their patients; this will help them move effectively into the nursing field and after graduation will able to provide qualified nursing care (Dubert CJ et. al., 2016)

Emotion regulation (ER) is a term commonly used to define a person's capability to efficiently manage and reply to an emotional experience across time and situations. (Scheibe S et al., 2015). It includes changes in emotional responding such as increasing, maintaining, or decreasing of positive and negative emotions. These changes may occur on three dimensions: the type of persons' emotions that have, the timing of experiencing their emotions, and how they experience and express these emotions (Gross J., 2015; Tamir M., 2016).

(ER) included four important components: awareness and understanding emotions, acceptance of emotions, ability to control impulsive behaviors and act according to the set objectives, despite experiences negative emotion, have ability to flexibility (depending on the situation and personal objectives) and select strategies of emotion regulation (Martin R & Ochsner K.,2016, Young.S 2019). One of the most well adaptive strategies of ER is cognitive reappraisal. It involves restoration of the cognitive demonstration of life events. It changes the way one experiences or thinks about potentially

emotional provoking events in non - emotional terms (Troy A., 2018).

Emotion dysregulation is used to describe an incapability using healthy strategies to moderate negative emotion. It was implicated in psychopathology; there's an association between stressful life events and depressive symptoms. Poor emotion regulation can partially explain increased depression after exposure to stressful experiences (Abravant BT, & Sinha.R.2015). One of the foremost maladaptive types of ER is suppression. It involves actively inhibiting expressive behaviors indicative of experienced emotions. Suppression is also decreasing expressed emotion, and cause a rise in sympathetic activation of psychological experience of negative emotions (France K., 2019). If the nursing students used suppression to cope with their negative emotions, it would impact on their psychological wellbeing. Also, used this strategy habitual with stressful events or critical cases leads to crisis, but if they learn to experience more positive emotions during their nursing practice, they can cope effectively with many stressful situations. (Lee M., & Jang S., 2020).

Emotion regulation is a dynamic process which contains suitably labeling and accepting emotions, adjusting impulses in the presence of negative emotion and modifying emotional responses to fit the situation and maintain goal directed behavior (Owens.GP et al., 2018). The developments of effective and adaptive emotion regulation strategies are critical for success and continuance in the nursing profession (McRae K., 2016). Therefore, Nursing Faculty should to concern on build wellbeing of their students through the training and development of effective coping skills to regulate their emotions. (Salimzadeh R., et al 2020)

Psychological wellbeing (PWB) is being contented with life and having understanding of positive emotions. this is often linked with the best academic function, improve social skills and physical health, a stage that lays strong foundation for future personality, and it's in addition as a critical period during human development during which life goals, values, direction and purpose in life are creative. Psychological wellbeing considered as a collection of psychological features involved in positive human functioning (Fitzgerald C. et al 2019)

Most criteria of PWB are linked to the individual's sense are self- acceptance, positive relation with others, autonomy, environment mastery

and having have purpose of life and personal growth (Leite A et al 2019). An optimal psychological functioning requires not only to actualize oneself and realize one's potentialities, but also to still to develop and expand oneself as a person, understanding the importance of new challenges or tasks at different periods of life (Sagone.E and Caroli.M. 2014).

From this point, it is conclude that nursing students who successfully regulate their emotion, they could enhance their psychological wellbeing, and improve their abilities to learn and recalling, this already affect their clinical performance, and ultimately improve nursing care they will provide to patients (Zganec A. et al.2017)

Significance of the Study:

Newcomer nursing students who are admitted on the nursing faculties in our country are considering in late adolescence aging. It might be expected changes in ER process and strategies from childhood to late adolescence, with stability obtained in adulthood. Determining the emotion regulation strategies that are used by newcomer nursing students during their period of adolescence and its' impact on their psychological wellbeing is a crucial important. This will help to understand students' wellbeing, and explore which factors are likely to account for the onset of psychosocial difficulties and psychopathology development, in addition to possibly providing indicators for prevention and training programs that will be engaged in nursing curriculum to face those difficulties on later future nursing.

Aim of the Study

This study aimed to assess difficulties of emotional regulation and psychological well-being among newcomer nursing students, and explore the relations between these two variables.

Research questions

1. What are the difficulties of emotional regulation and levels of psychological well-being among newcomer nursing students?
2. What are the relations between emotional regulation and psychological well-being of newcomer nursing students?

Materials and Methods

Research design: the present study followed descriptive correlation design.

Setting: the study was conducted at Faculty of Nursing, Tanat university of Tanta city. Egypt.

Subjects:

The study sample was all newcomer nursing students at the first academy year (2019- 2020) of Faculty of Nursing, their age ranged from 17 to 18 years, had the number of 452. The actual students' number who participated in this study was 387 after excluded 40 students involved in a pilot study, and 13 who didn't complete the questionnaire forms, and 12 students were absented during the time of data collection.

Tools of the study:

Data of study was carried by using two tools.

Tool one: Difficulties in emotion regulation scale (DERs), which was developed by **Gratz & Roemer (2004)** This scale measures difficulties in emotions regulation with particular emphasis on negative emotions. The scale is a 36 items self-report scored on six subscales: non-acceptance of emotional responses (6 items), lack of emotional clarity (5items), and difficulties engaging in goal directed behavior when distressed (5 items), impulse control difficulties (6 items), lack of emotional awareness (6 items), limited access to emotion regulation strategies (8items).

The items of the scale were scored on a 5 - point Likert scale that ranged from 1 (almost never) to 5 (almost always). The negative items had reverse score. The total score ranged from (36 to 180). The score of the participants was obtained by summing the corresponding items. Higher score suggested greater problems with emotion regulations.

Scoring systems: The level of difficulty in emotional regulation and its' subscales that was obtained by calculated the following way: less than 50 % from the total score referred to a lower level of difficulties; 50 -75% indicated a moderate level ; and more than 75% denoted to higher level of emotional regulation difficulties.

Tool two: Ruff Psychological well- being scales (PWB) that was developed by **Ruff C.D & Keyes C.L (1995)**. The scale was 42 items that measure positive aspects of psychological functioning along six dimensions in six scales, each of them consisted of 7 items as follows:

- Autonomy (independence &self- determination)
- Positive relations with others (having satisfying, high quality relationship)
- Environment mastery: (ability to manage one's life

- Personal growth: being open to new experiences
- Purposes of life: believing that one's life is meaningful
- Self- acceptance: a positive attitude toward oneself and his/her past life.

(PWB) scale comprised of 20 items has a positive content and 22 had negative items with reversed score. Each item of (PWB) has 6- point liker scale from strongly disagree (1) to strongly agree (6). The total score ranged from (42 - 252).The higher score indicated improved well- being.

Scoring systems: The levels of well- being were calculated and determined by the following: less than 50% from the total score refer to poor psychological well-being and 50 to75% indicate a moderate level and more than 75% means higher psychological well- being. Regarding the level of each dimension of psychological wellbeing in each scale the same percentage was calculated by the same way.

A Socio-demographic data was attached by the study tools. It was developed by the researchers; it involved: students' sex, address, parents' education and occupation and family income.

Method

The study was accomplished according to the following steps:

An official letter was addressed to the dean of the Faculty of Nursing to request their permission for data collection.

Ethical consideration:

- This study protocol was presented on ethical committee of our Faculty of Nursing and had approved for implementation.
- Informed consent obtained from newcomer nursing students to participate in the present study after explanation the purpose of the study.
- The students were reassured about confidentiality of their obtained information. A code of number was used instead of students' name on questionnaire sheets.
- Reassure the students about their right to refuse participation or withdrawal from the present study, and this didn't influenced by any way on their score in academic study.

Validity and Reliability

Tools of the study were translated to Arabic by researchers, and reviewed by a jury that composed of

five experts in psychiatric field to be examining the content validity.

Tool one and two were tested for reliability. Cronbach's alpha test was calculated, 0.96 was found for tool one, it means higher reliable. The reliability Tool two was 0.88, with aggregated subscales alphas of 0.72–0.88, except 0.57 for autonomy. Good construct validity and criterion-related validity of tool two were found.

Pilot study

A pilot study was applied on 10% (40 students) of total studied students in order to identify the obstacles and problems that may be encountered during data collection, determined time to fulfill the tools and to test clarity of tools; this sample was excluded from the actual study. The modification that was done involved changing few words to other more ones clarified, and one word was changed to other to be suitable to our culture.

Actual study

The researchers invited all newcomer-nursing students to participate in the present study after explaining the purpose of all-ethical considerations. The tools of the study were filled at the time of the break after clinical practice day at 12 p.m. six day per week. Volunteer students gave the researchers their consent to participate in the study and were grouped in small numbers in class; students filled the tools in the presence of researchers to give guidance, reassurance, and remove any confusion. The students consumed around 20 to 30 minutes for fulfilled the tools. The duration of data collection was around three weeks in first academic year 2019-2020.

Statistical analysis

SPSS, software computers statistically, version 20 used to compile, tabulate, and statistically analyze data. The information was provided in the form of a number and a percentage. Chi-Square(X^2) used to compare two variables in the same category in qualitative data. Spearman's rank Correlation was used to assess the form of relationship between two or more variables, as well as the magnitude of the relationship. The level of statistical significance was adopted at $P < 0.05$.

Results

Table one displays socio-demographic criteria of newcomer nursing students. This table appears that, most of students were female (72.1%) and

66.6% of students were from rural area. Regarding levels of their parents' education, more than half of fathers and mothers have secondary education (55.3%, & 56.6% respectively) and more than one quarter graduated from university (father 28.4%, mothers 29.2%). Furthermore, students' fathers occupied various works in close percentages, which mean that 25.06% were professionals, the same percentages were employees, and 22.73% have skilled works, while the few percentages perform manual work and retirement (14.2%, & 12.9% respectively). However, more than half of students' mothers (64.1%) are housewives, and 23.5% are employees. As for family income, the three quarters of their families have enough income (74.2%).

Figure one represents the levels of difficulties in emotional regulations among newcomer nursing students. 60.9% of students have moderate levels of difficulties, and 30.7% have lower level, while only 8.3% of students have high level of difficulties in regulating their emotions.

Table two describes a type of difficulties in regulating emotion among newcomer nursing students. This table shows that most of students have moderate level in all types of emotional regulation difficulties. Where more than half of students (65.4%) have lack of emotional awareness, 46.25% have difficulties in control impulse behaviors when distressed, 45.5% of students unaccepted their negative emotions, 44.2% of students have difficulties in engaging of goal directed behaviors when distressed and 43.9% have limited access in emotional regulation.

Figure two explores the level of psychological well-being of newcomer nursing students. The majority of them (79.1%) have a moderate level, 17.8% have high level, and 3.1% of students have a poor level of psychological well-being.

Table three discovers the dimensions of psychological well-being among newcomer students. Most of the students have a moderate levels of self-acceptance. Where 76.6% of students have positive relations with others, 65.89% have a feeling of autonomy, 61.8% have personal growth, 59.7% accepted themselves, 56.8% have purpose for their life, and 54.3% are masters of their environment. Table four shows the relation between difficulties in emotion regulations and psychological well-being among newcomer nursing students. There are statistically significant relations between psy-

chological well-being and students' difficulties in regulating their emotions.

Table four explores a negative correlation between psychological well-being of students and their difficulties in their regulation emotions. This explore that more difficulties in regulating emotions lead to more decrease in students' psychological well-being.

Discussion

Emotional regulation (ER) is refer to how a person sustains, strengthens, or impedes his/her emotions according to own goals (**Williams JHG et al.,2020**). Emotional regulation is fundamental for human life, and well-being. (**Tamir, M et al 2017**). Several studies explained how emotional regulation may become dysfunctional when the regulation of painful or negative emotions is not counterbalanced adequately and this leads to an inability to tolerate intense, unpleasant and persistent emotional states (**Wagh CE,2020, Beveren V et al., 2019, De Berardis D, 2020**).

The present study investigated emotional regulation of newcomer nursing students. It was observed that more than half of the students have a moderate difficult in their emotional regulation and around one third of them have a sever one. Regarding to the types of difficulties in their ER, the results show that more than half of the students have moderate to severe levels about lack of emotional awareness, difficult engaging in goal directed behaviors when distressed, lack of controlling impulse behaviors, unaccepted negative emotions and lack of their emotional clearly. This finding may be explained by those students who came from secondary school in an environment which encourages students to be dependent, they don't have skills such as labeling, accepting emotions, controlling impulses and adjusting emotional responses to fit life situations and maintain self-regulation. Furthermore, the nursing students who participated in the present study are in the late adolescence age.

Persons during adolescence period may experience a wide range of emotions are often in an "all-or-nothing" way. **Griffin E& McMahon E, 2020** pointed that adolescents experience emotions in extreme ways and are quickly changing in responding to, parental, social, environmental or internal factors. This explained why nursing students in the present study are unable to control their emotional effectively.

This is in agreement with, **Young KS et al., 2019**, who referred to adolescence as a period of life characterized by increased risk of an impulse behaviors, and reactivity, where emotional regulation

capacities develop substantially across this period. The evidence suggested that adolescents characterized by use of maladaptive strategies and limited in adaptive and efficacy of internal control emotions and gradual shifts toward increased healthy and adaptive strategies with age (**Werner-Seidler.A et al., 2013, Hofmann SC, et al.,2012, Zimmerman P et al.,2014**). Moreover, **Verzeletti C et al., (2016)** explored that an adolescences is a period of life which has events, that consider emotional challenges, such as new academic or work place pressure, increases importance of peer and romantic relationships, and reduces dependence on family support.

It is important to mention that, difficulties of emotional regulation among newcomer students in the present study have negative impact in on their psychological wellbeing. More difficulties in emotion regulations lead to more decrease in students' psychological well-being. The students in the current study have moderate level of wellbeing, especially in their ability to perform positive relations with others, the ability to develop their personality, sitting purpose for their life, feeling autonomy, being masters of their life situations and accepting themselves. This finding may be explained by those newcomer students who may be overwhelmed with stress during the first academic year of Faculty of Nursing that due to different reasons: *first*, they transfer from dependent environment in secondary school to an independent responsible life in faculty. *Second*, they are first faced with patients in hospital and have to deal with them. *Third*; they are less skilled and have little knowledge to deal with patients and solve clinical problems. In addition to, they may not have enough self-confidence, due to lack of self-control and regulation of their emotions.

In this context, the study by **Koutsopoulou G et al., (2010)** investigated the students' psychological well-being who came from faculties in UK University. They studied students across their undergraduate degree from pre-registration to the third academic semester. Their results show more stress on psychological students well-being once they start university stage compared to pre-university level. The Levels of stress were the highest during the first semester, with significant reduction in levels of stress from first semester to second semester. This goes with **Bewich B et al., (2010)**, who explored that students struggled with the highest levels of strain in the first academic year, compared with pre-university.

Furthermore, **Puthran R et al., (2016)** found that 33.5 % of medical freshman students had the highest rates of depression, which declined significantly over time to 20.5 % before graduation. This is in agreement with a study by **Lui X et al.,**

(2019). They discovered that Chinese faculty students experienced more mental problems in the first year; especially when students are separated from their parents and friends and have to orient themselves in new environment.

In this context, **Verzeletti C et al., (2016)**, studied how emotion regulations are associated with adolescents' well-being, they applied a survey on 633 Italian adolescents, and found that adolescents who use cognitive reappraisal greater have a higher level of psychological well-being and that those who used suppression to control their emotions suffered from negative well-being. In the same line, **Saxena P et al., (2011)** concluded that the feeling of persons with a higher level of difficulty in recognizing and describing feelings results in many mental health problems such as insomnia, anxiety, depression, social dysfunction, and other somatic complains. This is supported by a study of **Bamonti P et al., (2010)**, which revealed that one of the significant roles in predicting mental health problems and subjective well-being of an individual is the lack of emotional clarity and limited access to emotion regulation strategies. This is also supported by the findings of the present study.

Besides, **Owens G et al., (2018)** found on their study, limited emotion regulation strategies and

problems attending to recognizing emotions may be especially a critical component with anxiety and depression. On the other hand, adaptive emotions regulation strategies increase attention to and acknowledge of emotions and play a protective role in the development of depression following stressful events. Also recently, **France KD et al., (2019)** assessed the relation between emotional regulation and depressive symptoms during adolescence and their results indicated that suppression was any concurrently correlated with depressive symptoms and using reappraisal did not show concurrent correlation with depressive symptoms. This means that an adaptive way of controlling or regulate emotions acts as a protective agent against mental health problems.

It is important to mention that the study by **Aalbers S et al., 2020** emphasizes on the importance of intervention to build emotions regulation skills and help individual to cope with stress life events. In this point, we should mention that nursing is a stressful work and newcomer students need to learn how to cope effectively with stressful and critical situations facing during their caring for patients. Moreover, they need supportive educational programs to learn how to handle their emotional stress, maintain and develop their psychological well-being.

Table (1): Distribution of newcomer nursing students according to their socio- demographic characteristics. (No= 387)

Socio-demographic characteristics	Total (387)	
	No.	%
Sex: male female	108 279	27.9 72.1
Address Rural Urban	258 129	66.7 33.3
Level of father education Primary education secondary education Universal postgraduate	55 214 110 8	14.2 55.3 28.4 2.1
Level mother education Primary education secondary education Universal postgraduate	48 219 113 7	12.4 56.6 29.2 1.8
Father occupation Manual work skilled work Professional work employ retirement	55 88 97 97 50	14.2 22.73 25.06 25.06 12.91
Mother occupation Manual work skilled work Professional work employ housewife	14 6 28 91 248	3.6 1.6 7.2 23.5 64.1
Family income Sufficient and saved Enough income not enough	71 287 29	18.3 74.2 7.5

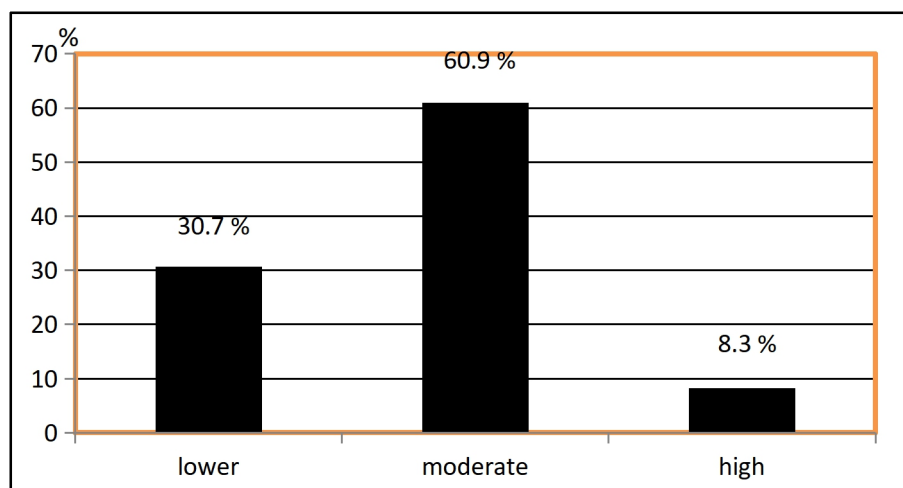
**Figure (1): Levels of difficulties in emotional regulation among newcomer nursing students (No. =387)**

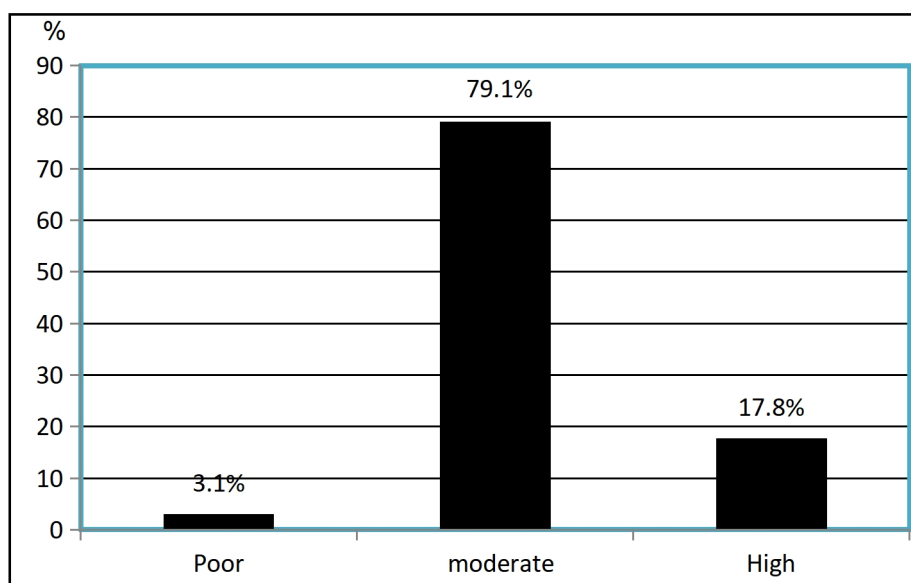
Table (2): types of emotional regulation difficulties among newcomer nursing students (No. =387)

Emotional regulation difficulties	Low		Moderate		high	
	No.	%	No.	%	No.	%
1. Lack of emotional awareness	57	14.7	253	65.4	77	19.9
2. Lack of emotional clarity	331	85.52	20	5.17	36	9.3
3. Difficulties controlling impulse behaviors when distressed	148	38.2	179	46.25	60	15.5
4. Difficulties in engaging in goal directed behaviors when distressed	131	33.9	171	44.2	85	21.9
5. Unaccepted negative emotional response	155	40.1	176	45.5	56	14.5
6. Limited access to emotional regulations	173	44.7	170	43.9	44	11.4

-Poor <50%

-Moderate 50% - 75%

- High > 75%

**Figure (2): Levels of psychological wellbeing among newcomer nursing students (No. =387)****Table (3): Dimensions of psychological wellbeing levels among newcomer nursing students (No. =387)**

Dimensions of psychological wellbeing	poor		Moderate		high	
	No.	%	No.	%	No.	%
1. Autonomy	49	12.7	255	65.89	82	21.2
2. Positive relation with others	27	6.9	290	74.9	70	18.1
3. Environmental mastery	56	14.5	210	54.3	121	31.3
4. Personal growth	34	8.8	239	61.8	114	29.5
5. Purpose of life	38	9.8	220	56.8	129	33.3
6. Self- acceptance	59	12.5	231	59.7	97	25.1
Total psychological wellbeing	12	3.1	306	79.2	69	17.8

-Poor <50%

-Moderate 50% - 75%

- High > 75%

Table (4): Relation between psychological wellbeing and emotional regulations levels among newcomer nursing students

Levels of psychological well being	Levels of difficulties in emotions regulations						p- value X ²	X ² p- value
	Lower		Moderate		High			
	No.	%	No.	%	No.	%		
lower	1	0.8	6	2.5	5	15.6	29.040	0.001*
Moderate	81	68.1	130	54.2	20	8.3		
High	17	7.1	18	7.5	1	0.4		

*Statistically Significant $P < 0.05$

-Poor <50%

-Moderate 50% - 75%

- High > 75%

Table (5): Correlation between psychological wellbeing and emotional regulations among newcomer nursing students

Items	Difficulties of emotional regulations	
	r	p
Psychological wellbeing	- 0.381	0.001*

*Statistically Significant $P < 0.05$

Conclusion

According to the finding of the present study, it concluded that the majority of the newcomer nurse students have moderate levels of difficulty in emotional regulations and psychological well-being. In addition, there was a negative correlation between their psychological well-being and their difficulties in regulating their emotions. This explores that more difficulties in emotions regulation lead to more decrease in students' psychological well-being.

Recommendation

Based on the findings of the present study the following recommendations are suggested:

- 1- Educational training program should be apply to learn and training new nursing student's strategies to improve their emotional regulations.
- 2- Health instruction should be applied for newcomer nursing students about effective methods to improve their psychological well-being.
- 3- Training new students stress management techniques before getting engaged in clinical practices to help them avoid emotional overwhelming

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Conflict of Interest Disclosure: the researchers declare that there is no conflict interest.

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