

Social Problem Solving Among Depressed Patients



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ABSTRACT

Background: Depression is a common psychiatric disorder associated with marked suffering, morbidity, mortality, and cost. The World Health Organization revealed that major depression will be the leading cause of disease burden worldwide in 2023. **Aim.** Assess social problem solving among depressed patients. **Subjects and Method.** The study was carried out using a descriptive cross section research design on a convenience sampling of 65 patients diagnosed with depression at the inpatient and out-patient psychiatric department of Mansoura university hospital. Two tools were used sociodemographic and Social Problem-Solving Inventory. **Results.** Result of the current study revealed that 55.4% of the total age group is between 30-45 years, female represent 61.5% of the patients 78.5% have insufficient income, the residence of 67.7% are in rural area and 66.4% are single. Regarding the total score of social problem-solving, the majority of patients (80%) demonstrate poor social problem solving. **Conclusion:** depressed patients had poor social problem-solving ability. **Recommendation:** improve social problem solving while caring for patients with depression.

Keywords, Depression, Social problem solving.

Introduction:

Major Depressive Disorder (MDD) is one of the leading causes of disability worldwide. It is an important issue of public health because of its pervasive effect on the condition of a life (*Shahid & Tushar, 2023*). It is not only causing a severe functional impairment but also adversely affects interpersonal relationships, thus lowering the quality of life. Individuals with MDD are at a high risk of developing comorbid anxiety disorders and substance use disorders, which further increases their risk of suicide (*Ratheesh et al., 2017*).

Ineffective Social Problem Solving is considered among major risk or vulnerability factors of depression (*Nezu et al., 2023*). Social problem solving is define as process by which individuals attempt to identify, discover, or create adaptive means of coping with stressful problems they encounter in everyday life. Problem solving ability that is regarded as an indicator on social capability might be a key component of psychological adaptation (*Hasegawa et al., 2018*).

Coping with problems are thought to be influenced by two factors: one's problem orientation and one's problem-solving style (*Nezu, Nezu, & D'Zurilla, 2012*). A Problem Orientation is a relatively stable way of viewing problems and one's ability to cope with them that can be classified as either positive or negative. Individuals with a Positive Problem Orientation (PPO) view

problems as challenges that are solvable, believe in their ability to cope with problems, understand negative emotional reactions as a normal part of the problem-solving process. On the other hand, people with a Negative Problem Orientation (NPO) view problems as threatening and unsolvable, doubt their ability to cope with problems, and become frustrated when dealing with problems or negative emotions (*Hittinger, 2018*).

Social problem-solving model identifies three problem solving styles. Rational problem solving is effective or adaptive problem-solving style, and impulsive/careless style and avoidant problem solving are considered maladaptive problem-solving styles. Rational Problem solving is a problem-solving approach that emphasizes the reasonable, intentional, and methodical application of effective problem-solving techniques. The problems are considered as a task that needs to be methodologically resolved (*Aburezeq & Kasik, 2023*).

Impulsive style is a set of restricted, impulsive, rushed, unfinished, and uncaring efforts to resolve problems. It is a method used by some people to tackle difficulties by attempting to solve them in a hasty or negligent manner. These efforts can be defined as hurried, limited, and incomplete (*Nezu et al., 2012*). Avoidant style is a problem-solving pattern that is characterized by

procrastination, inactivity, reliance, and inaction. The problem solver tries to delegate responsibility for his or her issue to others (*Aburezeq & Kasik, 2023*).

Ineffective problem solving plays a role in the etiology and maintenance of depression, several investigators have developed treatments for depression that specifically target social problem solving as depressed individual often exhibit a negative orientation toward problems in living (e.g., Appraising a problem as a threat, doubting one's own problem-solving ability) and deficits in specific problem-solving skills on self-report inventories and performance-based measures (*Klein et al., 2011*).

Psychiatric mental health nurse plays a vital role in the nursing care of individuals with depressive disorders and their families. Psychiatric nurse can provide health education to individuals and their families/other support persons in both one-to-one and group settings that are related to individual's needs, recovery goals, and situations. This teaching may include various topics such as treatment regimens and related self-management strategies, relapse prevention, coping skills, resources, self-care activities, problem-solving skills, conflict management, crisis management, stress management, relaxation techniques and mindfulness exercise (*American Nursing Association, 2014*).

Moreover, the psychiatric nurse uses counseling interventions to assist clients in improving coping abilities, fostering mental health, prevent relapse of depression, and promotes the client's personal and social integration; reinforces healthy behaviors. The counselor provides reassurance and clarification as the need arises. Reassurance helps the client regain self-confidence and decreases feelings of guilt (*Shives, 2016*).

Aim of the study:

This study aimed to assess social problem solving among depressed patients.

Subjects and method:

Study design:

A descriptive cross sectional research design was used in this study.

Setting:

The study was conducted at in-patient and out-patient clinics of psychiatric department at Mansoura university hospitals.

Study sample:

The researcher used a convenience sampling technique of 65 patients to fulfill the following criteria.

Inclusion criteria

- All patients with depressive disorders according to criteria of the Diagnostic and Statistical Manual of Mental Disorders, 5th Edition, according to patient's records.
- Both genders.
- Age from 18- less than 60 years old.
- Able to communicate.
- Patients with depressive disorders were not related to substance abuse.
- Patients with depressive disorders were not related to organic disease.

Tools: Two tools were utilized to collect data in this study based on reviewing recent related literature:

Tool (1): Socio-demographic and clinical characteristics sheet:

The researcher developed this sheet to assess socio- demographic characteristics and clinical data including the following:

- Socio-demographic data includes age, sex, birth order, income, residence, marital status, occupation, and educational level.
- Clinical Data include: duration of depression, number of hospital admission, treatment adherence, suicide and family history of mental illness.

Tool (2): Social Problem-Solving Inventory-Revised-Short Form (SPSI-R-SF):

D'Zurilla, Nezu, & Maydeu-Olivares, (2002) developed this tool to assesses problem-solving ability in everyday living. It consists of 25 items short version that composed of five dimensions: positive problem orientation (PPO) consists of five items include (4,5,9,13 and 15), negative problem orientation (NPO) consists of five items include (1,3,7,8 and 11), rational problem solving style (RPS) consists of five items include (12,16,19,21 and 23), impulsivity/carelessness style (ICS) consists of five items include (2,14,20,24 and 25) and avoidance style (AS) consists of five items include (6,10,17,18 and 22: Each sub-score contains five items that are scored on responses five-point Likert-type rating scale, ranging from 0 (not at all true) to 4 (extremely true) .

Positive problem solving includes positive problem orientation and rational problem solving, on the other hand negative problem solving

includes negative problem orientation, impulsivity/carelessness style and avoidance style. Individuals with good social problem solving must have low scores on negative problem solving and high scores on positive problem solving. On the other hand, individuals with poor social problem solving must have low scores on positive problem solving and high scores on negative problem solving.

The validity of the study tools:

The researchers translated this tool into slang Arabic language, checked twice and corrected. Then five experts in the field of psychiatric nursing and English language tested the content validity of translated tool and evaluates how well the designed tools covers all relevant parts of the construct it aims to measure.

Face validity that is about whether a test appears to measure what it's supposed to measure. It is concerned with whether a measure seems clearly relevant and appropriate for what it's assessing and adequate for its purpose. These tests were used to evaluate the clarity, applicability, and reliability of the study tools and to estimate the approximate time required for data collection. Also, it helped to determine the obstacles and problems that may arise during the actual collection of data. No modification was done.

The reliability of the Arabic version of this scale, test-retest showed that Cronbach's Alpha equalized 0.751 which reflects good internal consistency according to (Gliem, 2003). The intra-rater reliability assessment equalized .879 which reflects agreement according to (Cuchna, Hoch, & Hoch, 2016).

Pilot study: The researcher conducted the pilot study on 10% (6) of the study participants and excluded from the study. Pilot study uses the results to guide the methodology of the large-scale investigation and determine the feasibility of the study.

Ethical considerations:

The researcher obtained approval from Research Ethics Committee, Faculty of Nursing, consequently obtained oral consents from the head of the Mansoura University Hospital's psychiatric department, after explaining the aim of the study and assured them that their data be treated anonymously, confidentially and used for research purpose only. In addition, each participant had the right to ask any question related to the study as well, withdraw at any time without given any reason.

Statistical analysis:

Data was analyzed using SPSS (Statistical Package for Social Sciences) version 22. Data were presented by using descriptive statistics in the form of frequencies and percentages, qualitative variables were described by the mean and standard deviation (SD). All tests were performed at a level of significance (P-value) equal or less than 0.05 was considered statistically significant.

Results:

Table (1) This table showed that age of the studied patients ranged from 18- 60 years with a mean \pm SD of (40.3846 \pm 6.77). More than half of subject (55.4%) was among age group of 30 to 45 years. Two third of the study subjects were female (61.5%). According to level of education 33.8% had diploma degree. Regarding marital status nearly half of the studied subjects (47.7%) were single. More than half of studied participants (56.7%) weren't working. The residence of (67.7%) was in rural. Concerning satisfactory of income nearly two thirds of the studied subject (78.5 %) had insufficient income.

Table (2): This table showed that two third of studied subjects (69.2%) had family history. According to duration of disorder (52.3%) of studied subject had disorder for 2 to5 years. According to admission of hospital nearly two thirds of the studied participants (77.5%) were admitted by involuntary way. Most of studied subject (85%) had previous psychiatric treatment. According to the medication adherence, (38.5%) of the studied subjects had no adherence to medication and (43.1%) of studied participants were adherent interruptedly. More than half of studied subject (56.9%) have suicide ideation.

Table (3): This table showed that half of studied subject (50.8%) neglected personal hygiene. Nearly two thirds of the studied subject (61.7%) had anorexia. Half of the studied subject (50.8%) was sleeping from 4 to 6 hour in the day. Also, majority of the studied subjects (86.2%) reported sleep disturbance, (38.5 %, 32.3 %, 15.4 %) difficulty initiate sleep, difficulty maintain sleep, wake up and can't sleep again respectively. Regarding physical illness, one third of the studied subject complained from physical illness.

Table (4): This table illustrated that more than half of the studied subject (55.4%) reported that family members ranged from four to six members. According to birth order more than half (53.8%) of patients were located in the middle, (50.8%) lived with their parents while (6.2%) lived

alone. Most of studied subject 50.8% were not initiators but maintains interaction with others.

Table (5): This table showed the prevalence of poor social problem solving among the studied sample was (80%), while good social problem solving represented (20%).

Table (6): This table demonstrated the total score of social problem solving is (32.6±20.1), mean scoring of Positive problem orientation is (7.36±2.26), mean scoring of Negative problem orientation is (7.21±4.21) and mean scoring of Rational problem-solving style is (5.73±4.001), mean scoring of Impulsivity/carelessness style is

(7.13±4.08) and mean scoring of Avoidance style is (7.49±4.38).

Table (7): This table showed the correlation between socio-demographic & clinical characteristics of the depressed patients and social problem solving. There is a highly significant positive correlation between marital status and social problem solving ($r=.322$ with significance .009). There is a significant negative correlation between duration of illness and social problem solving ($r=.237$ with significance .045) and between eating disturbance and social problem solving ($r=.282$ with significance .023).

Table(1)Frequency Distribution of Studied Participants According To Socio-demographic Characteristics (N= 65):

| Socio-demographic characteristics | Number (n) | Percent (%) |
|---|------------|-------------|
| Age in years | | |
| 1. 18- <30 | 6 | 9.2 |
| 2. 30- <45 | 36 | 55.4 |
| 3. 45- <60 | 23 | 35.4 |
| Mean ± SD 40.3846 ± 6.77471 | | |
| Gender | | |
| 1. Male | 25 | 38.5 |
| 2. Female | 40 | 61.5 |
| Education | | |
| 1. Illiterate | 14 | 21.5 |
| 2. Read & Write /Primary/Preparatory School | 23 | 35.4 |
| 3. Secondary and Technical school | 22 | 33.8 |
| 4. University / Post graduate | 6 | 9.2 |
| Marital status | | |
| 1. Single | 31 | 47.7 |
| 2. Married | 22 | 33.8 |
| 3. Divorced | 9 | 13.8 |
| 4. Widow | 3 | 4.9 |
| Residence | | |
| 1. Rural | 44 | 67.7 |
| 2. Urban | 21 | 32.3 |
| Occupation | | |
| 1. Not work | 23 | 43.1 |
| 2. House wife | 17 | 26.2 |
| 3. Manual work | 21 | 32.3 |
| 4. Professional work | 4 | 6.2 |
| Income | | |
| 1. Sufficient | 14 | 21.5 |
| 2. Insufficient | 51 | 78.5 |
| Total | 65 | 100% |

Table (2) Frequency distribution of the studied participants according to clinical data (N =65)

| Clinical Data | N (65) | 100% |
|---|---------------|-------------|
| Family history | | |
| 1. Negative | 20 | 30.8 % |
| 2. Positive | 45 | 69.2 % |
| Duration of disease | | |
| 1. > 2 years | 12 | 18.5% |
| 2. years -less than5 years | 34 | 52.3% |
| 3. 5 years- less than 10 years | 18 | 27.7% |
| 4. 10 years or more | 1 | 1.5% |
| Mode of admission | | |
| 1. Involuntary | 31 | 77.5% |
| 2. Voluntary | 9 | 22.5% |
| Previous psychiatric treatment | | |
| 1. No | 6 | 15% |
| 2. Yes | 34 | 85% |
| Adherence to psychiatric treatment | | |
| 1. No | 25 | 38.5% |
| 2. Yes, regular | 12 | 18.5% |
| 3. Yes, interrupted | 28 | 43 |
| Number of admissions | | |
| 1. From 1- 2 times | 40 | 61.5% |
| 2. From 3-5 times | 23 | 35.4% |
| 3. More than 5 times | 2 | 3.1% |
| Suicidal ideation | | |
| 1. No | 28 | 43.1% |
| 2. Yes | 37 | 56.9% |
| Total | 65 | 100% |

Table (3) Frequency distribution of studied participants according to Physical condition (N= 65)

| Physical Condition | N (65) | 100% |
|-----------------------------|---------------|-------------|
| Personal Hygiene | | |
| 1. Neglect it | 33 | 50.8% |
| 2. Done with help | 15 | 23.1% |
| 3. Done alone | 17 | 26.1% |
| Eating Habit | | |
| 1. Refuse eating | 9 | 13.8% |
| 2. Anorexia | 44 | 67.7 % |
| 3. Eat and ask for more | 12 | 18.5 % |
| Sleeping hours | | |
| 1. From Less than 4 hours | 22 | 33.8% |
| 2. From (4-6) hours | 33 | 50.8% |
| 3. From 6 -8 hours and more | 10 | 15.4% |

| | | |
|--|-----------|-------------|
| Sleep problem | | |
| 1. No | 9 | 13.8 % |
| 2. Yes | 56 | 86.2 % |
| If yes: | | |
| 1. Early Insomnia | 25 | 38.5 % |
| 2. Interrupted Sleep | 21 | 32.3 % |
| 3. Late Insomnia | 10 | 15.4 % |
| Chronic physical illness (Hypertension- Diabetes) | | |
| 1. No | 46 | 70.8 % |
| 2. Yes | 19 | 29.2 % |
| Total | 65 | 100% |

Table (4) Frequency Distribution Of Studied Participants According To Social Condition (N= 65)

| Social condition | Number (n) | Percent (%) |
|---|-------------------|--------------------|
| Numbers of family members | | |
| 1. Less than 4 members | 21 | 32.3 |
| 2. (4-6) members | 36 | 55.4 |
| 3. More than 6 members | 8 | 12.3 |
| Birth order | | |
| 1. The Younger | 23 | 35.4 |
| 2. The Middle | 35 | 53.8 |
| 3. The Older | 7 | 10.8 |
| Living with whom | | |
| 1. Alone | 4 | 6.2 |
| 2. Parents | 33 | 50.8 |
| 3. wife/ husband and Children | 22 | 33.8 |
| 4. Brothers | 6 | 9.2 |
| Social Interaction | | |
| 1. Not initiate and maintains interaction with others | 12 | 18.5 |
| 2. Initiates but not maintain interaction with others | 13 | 20 |
| 3. Not initiate but maintains interaction with others | 33 | 50.8 |
| 4. Initiates and maintains interaction with others | 7 | 10.8 |
| Total | 65 | 100% |

Table (5) Frequency distribution of social problem solving

| Social problem solving | N | % |
|-------------------------------|----------|----------|
| Poor social problem solving | 52 | 80% |
| Good social problem solving | 13 | 20% |

Table (6) Mean Scoring system of social problem solving

| Social problem solving | Mean ± SD |
|--|------------------|
| Total score of social problem solving | 32.6±20.1 |
| Dimension of social problem solving. | |
| ➤ Positive problem orientation (PPO) | 7.36±2.26 |
| ➤ Negative problem orientation (NPO) | 7.21±4.21 |
| ➤ Rational problem-solving style (RPS) | 5.73±4.001 |
| ➤ Impulsivity/carelessness style (ICS) | 7.13±4.08 |
| ➤ Avoidance style (AS) | 7.49±4.38 |

Table (7) Correlation between socio-demographic & clinical characteristics of the depressed patients and social problem solving

| | Socio-demographic&clinical characteristics | Pearson orrelation(r) | Sig.(p) |
|------------------------|--|-----------------------|---------|
| Social problem solving | Education | .038 | .766 |
| | Marital status | .322** | .009 |
| | Occupation | .064 | .611 |
| | Non adherence to medication | -.021 | .871 |
| | Duration of illness | -.237* | .045 |
| | Eating disturbance | -.282* | .023 |
| | Sleep disturbance | -.021 | .868 |
| | Social interaction | .008 | .953 |

r is the correlation coefficient of Pearson.

* The correlation is significant at the 2-tailed 0.05 level

** the correlation is significant at the 2-tailed 0.01 level.

Discussion:

Depression leads to impairment in individual's mood, thoughts and functioning, this impairment is severe enough to cause disturbance in social and occupational life (*Wiltsee, 2015*).

In the present study the characteristics of studied patients revealed that more than half of the total sample was at the age group between 30-45 years. This may be related to overload from several responsibility, life event stressors and family dysfunction. This outcome was in line with a report by *Otte (2016)* who stated that the median reported age of onset of major depressive disorder is approximately 25 years.

Majority of the patients in the present study were female. This result may be due to hormonal changes that make women more susceptible to depression. Women exposed to hormonal changes through their life that enhance different type of depression such as premenstrual dysphoric disorder and postpartum depression. This finding in the same line with *Zhao et al., (2022)* who report that there are gender differences in depression and prevalence of depression is higher in women than in men worldwide.

In relation to educational level the study showed that more than half of participants are illiterate and read & write. This may be related to educated individuals are able to have health behavior, awareness to sign and symptom of depression, identify coping strategies with stressors and compliance to treatment. However, individuals with lower levels of education face socioeconomic

challenges, including poorer access to healthcare and less access to screening and treatment of depression. This result was in harmony with *Felmingham & Islam, (2022)* who stated that lower levels of education was associated with increasing rates of depression.

In relation to residence, the study indicated that majority of the recruited sample from the rural area. This may be due to rural residents are characterized as a vulnerable population because they are likely to report lack health insurance and live-in poverty. Rural areas typically lack social, health, and especially mental health services, and services that do exist are described as disjointed and lacking in consistency (*Brossart et al., 2013*). This result is congruent with *Vallury, Jones and Oosterbroek (2015)* approved that people living in rural and remote communities have greater difficulty accessing mental health services and greater rate of depression.

The current study showed that nearly half of participants are single. This may be result from little emotional support they receive and marriage provides interpersonal support. This is consistent with *Becchetti and Conzo, (2022)* who state that one key social factor that modifies depression is marital status that consider major influencing factor in mental health as married respondents are better mental health, higher subjective well-being and lower depression than respondents who are divorced, separated, widowed, and never married. Also, this result is congruent with *Bulloch et al., (2017)* showed that being unmarried is a significant risk factor for depression in late life.

Concerning income, the majority of studied subjects have insufficient income. This may be due to individual with low income are likely to exposed to several stressors such as inadequate housing and monetary shortfalls, as well as, increased exposure to discrete major life stressors increasing individuals' vulnerability to psychological distress and predictor of depressive symptoms. This result agrees with *Matsumura et al., (2019)* who reported that lower socioeconomic status being related to increased risks of psychiatric diseases including depression.

The current study showed that nearly half of studied subject were not work. This may be due to symptoms of depression either cognitive dysfunction or other symptoms have destructive effects on employment outcomes. This result consistent with *Woo and Zhang (2020)* who state employment protects psychological health by providing meaning to people's lives. Unemployment is associated with an increased risk of depression and the risk of depression is higher among the unemployed than among the employed.

According to the current study, more than two thirds of patients had positive family history of mental illness. This outcome is a result of the influence of genetics factors and hereditary, which are frequently a predisposing factor for mental illness. This outcome was in line with *Slavich and Gotlib (2014)* who revealed that three of the most consistently reported and powerful predictors of depression are a recent major life event, a positive family history for depression, and a personal history of past depressive episodes.

The present study found that more than half of the studied sample have suicidal ideation. This may be related to depressed mood, feeling of hopeless, helpless, worthless, pessimistic, guilty, loss of interest in ordinary activities and persistent physical symptoms or pains that do not respond to treatment. This result consistent with *Ponsoni et al. (2018)* who reported that the association between depression and suicide has been well documented.

Also, the result displays that most of the depressed patients were with poor social problem-solving. This may be related to the negative thought processes associated with rumination heighten negative affect and interfere with an individual's ability to engage in effective social problem solving and adaptive behaviors. This explanation congruence with *Samadi and Sohrabi (2016)*, who concluded that the majority of depressed patients suffering from deficient social problem-solving skills.

Moreover, the majority of depressive patients frequently have a negative attitude toward life's challenges (e.g., viewing an issue as a danger, doubting one's own capacity to solve difficulties); this could be a plausible explanation for why depressed people struggle with social problem-solving. Additionally, hopelessness—a person's pessimism about the future—is a key component of depressive thinking and might hinder social problem-solving (*Noreen & Dritschel, 2022*). This finding aligns with the findings of *Hasegawa et al. (2018)*, who found that sadness exacerbates weak social problem-solving abilities.

Conclusion:

Based on the findings in the current study, it can be concluded that the majority of the studied subjects have poor social problem solving.

Recommendations:

Based on the current results the following recommendations are suggested:

- Psycho education programs for depressed individuals about the nature of their disorder.
- Training programs for depressed individuals how to improve social problem solving and to have positive problem orientation to problem.
- Using social problem solving as assessment method in early detection and prevention of depression.

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Reference

- Aburezeq, K., & Kasik, L. (2023).** The characteristics of social problem-solving among Palestinian adolescents. *Hungarian Educational Research Journal*, 13(2), 155-169.
- American Nurses Association (ANA). (2014).** Psychiatric-mental health nursing: Scope and standards of practice, 2nd ed., Silver Spring, MD: Nursesbooks.org, 168-186.
- Becchetti, L., and Conzo, G. (2022).** The gender life satisfaction/depression paradox. *Soc. Indic. Res.* 160, 35–113. doi: 10.1007/s11205-021-02740-5.
- Brossart, D. F., Wendel, M. L., Elliott, T. R., Cook, H. E., Castillo, L. G., & Burdine, J. N. (2013).** Assessing depression in rural

- communities. *Journal of Clinical Psychology*, 69(3), 252-263.
- Bulloch, A. G., Williams, J. V., Lavorato, D. H., & Patten, S. B. (2017).** The depression and marital status relationship are modified by both age and gender. *Journal of affective disorders*, 223, 65-68.
- Cuchna, J. W., Hoch, M. C., & Hoch, J. M. (2016).** The inter-rater reliability of the functional movement screen: A systematic review with meta-analysis. *Physical Therapy in Sport*, 19, 57-65.
- D'Zurilla, T. J., Nezu, A. M., & Maydeu-Olivares, A. (2002).** Social problem-solving inventory-revised.
- Dwyer, J. B., Aftab, A., Radhakrishnan, R., Widge, A., Rodriguez, C. I., Carpenter, L. L., ... & APA Council of Research Task Force on Novel Biomarkers and Treatments. (2020).** Hormonal treatments for major depressive disorder: state of the art. *American Journal of Psychiatry*, 177(8), 686-705.
- Felmingham, T., & Islam, F. M. A. (2022).** Relationship between Sociodemographic Factors and Depression in Australian Population Aged 16–85 Years. *Applied Sciences*, 12(24), 12685.
- Gliem, J. A. (2003).** Calculating, interpreting, and reporting Cronbach's alpha reliability coefficient for Likert-type scales. Midwest Research-to-Practice Conference in Adult, Continuing, and Community Education.
- Hasegawa, A., Kunisato, Y., Morimoto, H., Nishimura, H., & Matsuda, Y. (2018).** How do rumination and social problem solving intensify depression? A longitudinal study. *Journal of Rational-Emotive & Cognitive-Behavior Therapy*, 36, 28-46.
- Hittinger, S. M. (2018).** The relationship between stress, social problem solving, and psychological distress in mothers of daughters with eating disorders.
- Klein, D. N., Leon, A. C., Li, C., D'Zurilla, T. J., Black, S. R., Vivian, D., ... & Kocsis, J. H. (2011).** Social problem solving and depressive symptoms over time: a randomized clinical trial of cognitive-behavioral analysis system of psychotherapy, brief supportive psychotherapy, and pharmacotherapy. *Journal of consulting and clinical psychology*, 79(3), 342.
- Matsumura, K., Hamazaki, K., Tsuchida, A., Kasamatsu, H., & Inadera, H. (2019).** Education level and risk of postpartum depression: results from the Japan Environment and Children's Study (JECS). *BMC psychiatry*, 19, 1-11.
- Monroe, S. M., Slavich, G. M., & Gotlib, I. H. (2014).** Life stress and family history for depression: The moderating role of past depressive episodes. *Journal of psychiatric research*, 49, 90-95.
- Nezu, A. M., Nezu, C. M., & D'Zurilla, T. J. (2012).** *Problem-solving therapy: A treatment manual*. springer publishing company.
- Nezu, A. M., Nezu, C. M., Damico, J. L., & Gerber, H. R. (2023).** Ineffective social problem solving. In D. J. A. Dozois & K. S. Dobson (Eds.), *Treatment of psychosocial risk factors in depression* (pp. 333–358). American Psychological Association. <https://doi.org/10.1037/0000332-015>.
- Noreen, S., & Dritschel, B. (2022).** In the here and now: Future thinking and social problem-solving in depression. *Plos one*, 17(6), e0270661.
- Otte, C., Gold, S. M., Penninx, B. W., Pariante, C. M., Etkin, A., Fava, M., ... & Schatzberg, A. F. (2016).** Major depressive disorder. *Nature reviews Disease primers*, 2(1), 1-20.
- Ponsoni, A., Branco, L. D., Cotrena, C., Shansis, F. M., Grassi-Oliveira, R., & Fonseca, R. P. (2018).** Self-reported inhibition predicts history of suicide attempts in bipolar disorder and major depression. *Comprehensive psychiatry*, 82, 89-94.
- Ratheesh, A., Davey, C., Hetrick, S., Alvarez - Jimenez, M., Voutier, C., Bechdolf, A., ... & Cotton, S. M. (2017).** A systematic review and meta - analysis of prospective transition from major depression to bipolar disorder. *Acta Psychiatrica Scandinavica*, 135(4), 273-284.
- Samadi, M., & Sohrabi, N. (2016).** Mediating role of the social problem solving for family process, family content, and adjustment. *Procedia-Social and Behavioral Sciences*, 217, 1185-1188.
- Shahid, S. F. B., & Tushar, T. A. (2023).** Mst. Mahmuda Khatun, Nazia Binte Noor. *Social Avoidance among Patients with Major*

Depressive Disorder in Bangladesh. Sch J App Med Sci, 2, 471-476.

Shives, L. (2016). Basic concepts of psychiatric-mental health nursing. 11th ed., Philadelphia: Wolters Kluwer/Lippincott Williams & Wilkins, 302-304.

Vallury, K. D., Jones, M., & Oosterbroek, C. (2015). Computerized cognitive behavior therapy for anxiety and depression in rural areas: a systematic review. *Journal of medical Internet research*, 17(6), e139.

Voinov, B., Richie, W. D., & Bailey, R. K. (2013). Depression and chronic diseases: it is time for a synergistic mental health and primary care approach. *The primary care companion for CNS disorders*, 15(2), 26226.

Wiltsee, T. (2015). An examination of the relationships between rumination, social problem-solving, mindfulness and depressive symptomology.

Woo, K. M., & Zhang, Z. S. (2020). The Effect of Unemployment in Depression by Age Group: Using 12 States' Data from the Behavioral Risk Factor Surveillance System. *Research in Community and Public Health Nursing*, 31(4), 436-446.

Zhao, L., Zhang, K., Gao, Y., Jia, Z., & Han, S. (2022). The relationship between gender, marital status and depression among Chinese middle-aged and older people: Mediation by subjective well-being and moderation by degree of digitization. *Frontiers in Psychology*, 13, 923597.