Psikiyatride Güncel Yaklaşımlar-Current Approaches in Psychiatry 2021; 13(1):52-76
Doi: 10.18863/pgy.721987

Psychosocial Interventions for Individuals with Severe Mental Illness and Their Familes in Turkey: A Systematic Review

Türkiye'de Ağır Ruhsal Hastalığa Sahip Bireylere ve Ailelerine Yönelik Psikososyal Müdahaleler: Sistematik Bir İnceleme

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Abstract

The aim of this study is to describe the psychosocial interventions for individuals with severe mental illness and/or their families in Turkey, and evaluate their results. Turkish Psychiatry Index, Turkish Medline, Council of Higher Education National Thesis Center, Google Scholar, and TR Index databases were searched to identify the studies conducted with individuals with severe mental illness and/or their families between 2000 and 2019. As a result of the search, 2404 studies were obtained in total, and 36 of them were selected to be evaluated. 16 of the studies examined are published research articles, 10 are PhD theses, 6 are master's theses, and 4 are medical dissertation. While the majority of the psychosocial intervention programs (47.2%) are psychoeducation studies, 11 (30.5%) are original skill trainings and 8 (22.2%) are problem- or symptom-oriented studies. The average number of samples of intervention programs mostly practiced by nurses is 30.5, and the average intervention period is 10.5 sessions. The results reveal that the positive effects of the applied programs on the areas such as social functionality, treatment compliance and quality of life for individuals with severe mental illness; and subjective burden, coping strategies, emotional expression and family functionality for caregivers. It is extremely important for individuals with severe mental illness and their families to extend these programs, which currently seem to be implemented in a limited way in Turkey, and to make them a part of routine clinical practice.

Keywords: Individual with severe mental illness, family, psychosocial intervention

Öz

Bu çalışmada, ağır ruhsal hastalığa sahip bireylere ve/veya ailelerine yönelik Türkiye'de gerçekleştirilen psikososyal müdahaleleri betimlemek ve sonuçlarını değerlendirmek amaçlanmıştır. 2000 ve 2019 yılları arasında Türkiye'de ağır ruhsal hastalığa sahip bireyler ve/veya aileleri ile yapılan çalışmaları belirlemek için Google, Türk Psikiyatri Dizini, Türk Medline, YÖK Ulusal Tez Merkezi, Google Akademi ve TR Dizin veri tabanları taranmıştır. Tarama sonucunda, 2404 çalışmaya ulaşılmış, 36 sonuç değerlendirmeye alınmıştır. İncelenen çalışmaların 16'sı yayımlanmış araştırma makalesi, 10'u doktora tezi, 6'sı yüksek lisans tezi ve 4'ü de tıpta uzmanlık tezidir. Uygulanan psikososyal müdahale programlarının büyük çoğunluğunu (%47,2) psikoeğitim çalışmaları oluşturmakla birlikte 11'ini (%30,5) özgün beceri eğitimleri, 8'ini de (%22,2) sorun veya belirti odaklı çalışmalar oluşturmaktadır. Çoğunlukla hemşireler tarafından gerçekleştirilen müdahale programlarının ortalama örneklem sayısı 30,5 olup, ortalama müdahale süreci 10,5 oturumdur. Uygulanan programların ağır ruhsal hastalığa sahip bireylerde sosyal işlevsellik, tedaviye uyum, yaşam kalitesi gibi alanlarda, bakım verenlerde ise sübjektif yük, baş etme yöntemleri, duygu dışavurumu, aile işlevselliği gibi alanlarda olumlu yönde etkileri ortaya konmuştur. Türkiye'de kısıtlı bir şekilde uygulandığı görülen bu programların yaygınlaştırılması ve rutin klinik uygulamanın bir parçası haline getirilmesi ağır ruhsal hastalığa sahip birey ve aileleri için son derece önemlidir.

Anahtar sözcükler: Ağır ruhsal hastalığa sahip birey, aile, psikososyal müdahale

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Received: 17.04.2020 | Accepted: 30.05.2020 | Published online: 12.11.2020

SEVERE mental illnesses are lifelong chronic diseases such as schizophrenia and similar psychotic disorders, and mood disorders (bipolar disorder) that cause disability in individuals due to their destructive effect in the areas of cognitive, managerial and social skills (R.T.Ministry of Health 2011). In this respect, although the medical treatment in severe mental illnesses often ensures recovery in symptoms, it is not sufficient alone to solve the problems experienced by individuals with severe mental illness (SMI) in realizing their identity and taking control of their life, especially as emphasized by the new recovery approach. In the disease process associated with impaired functionality, it is important for individuals with SMI to benefit from comprehensive psycho-social interventions as well as medical treatment in order to take control of their life and lead a meaningful life with hope (Doğan 2002, Liberman 2009, Tirupati 2018, Yıldız et al. 2018).

Among the psychosocial interventions applied to individuals with SMI, several types such as the psychoeducation/mental training, individual or group psychotherapy studies, skill training, cognitive improvement, metacognition training, case management, job adaptation programs (vocational training, supported employment), alcohol and substance addiction program, weight management program and cognitive behavioral therapy, can be addressed. Besides, for their families, the interventions such as family training, family-to-family support program, family support groups, crisis management, individual or group psychotherapy studies (cognitive behavioral therapy, motivational interview, family therapy etc.) can also be frequently noticed (Doğan 2002, Liberman 2009, Pharoah and et al. 2010, Bademli and Çetinkaya Duman 2011, Yıldız et al. 2018).

Adams et al. (2000), on the other hand, divided the psychosocial interventions, in which they expressed briefly as non-pharmacological interventions, into three treatment strategies. (1) informative, i.e. psychoeducation studies, (2) original skills training programs (life skills training, social skills training, mental social skills training-RUTBE) and (3) problem- or symptom-oriented psychosocial interventions (cognitive behavioral therapy, cognitive rehabilitation/metacognition training, psychotherapy studies). In this review study, psychosocial interventions for individuals with SMI and/or their families were analyzed by using the classification of intervention strategies specified by Adams et al. (2000).

Psychosocial interventions started to be practiced in addition to the drug therapy from 1970s. As an internationally accepted term among these interventions, psychoeducation is a method of intervention that combines the imparting of information with therapeutic elements (Pitschel Walz et al. 2001). Psychoeducation is an educational approach that is frequently used in the treatment of mental illnesses in order to reduce the disability due to mental illnesses, and to inform the individuals and their families about the disease and coping methods. These approaches have been shown to have a significant effect in reducing symptoms related to diseases and relapse, reducing the frequency of hospitalization, and increasing the compliance of individuals and their families to treatment as well as empowering them (Mari and Streiner 1994, Pitschel Walz et al. 2001, Pharoah et al. 2010). It is emphasized that psycho-education interventions, especially for families, are more important in terms of affecting not only themselves but also the individual with SMI in

a positive manner (increasing compliance to the disease and treatment, increasing drug compliance, decreasing the recurrence and re-hospitalization frequency) (Mari and Streiner 1994, Pitschel Walz et al. 2001, Pharoah et al. 2010).

Through the life skills training, which is one of the original skills training programs, individuals with SMI are aimed to have independent living skills. It includes the individual or group level trainings to gain skills in personal care, and routine household activities such as money management, cooking and cleaning. Through social skills training, individuals are encouraged to develop effective social communication skills by transforming their behavior patterns. Programs developed to ensure or increase SMI individuals' participation in employment (vocational training, supported employment, etc.) are also covered within the scope of social skills training (Adams et al. 2000). Through RUTBE, which is based on informative and skill training, both the individuals and their families are made aware of the disease and their own states; and their compliance to treatment, their ability to cope with disease symptoms, and their individual and social life skills are tried to be increased. With the structured information and application techniques in which their families are involved in the process, it is aimed to acquire the skills (cognitive, communication, problem solving skills, etc.) that enable individuals to be more functional in their social life (Yıldız et al. 2005).

Problem- or symptom-oriented psychosocial interventions cover more specific and specialized therapy methods such as cognitive behavioral therapy and psychoanalysis, as well as cognitive skills training, which includes improving the basic cognitive processes of individuals such as memory, attention, processing speed, and abstraction levels. Through the most frequently used cognitive behavioral therapy, it is aimed to make changes by establishing a connection among the thought patterns that support the emotions and problems of both individuals with SMI and their families. The self-esteem of individuals is tried to be increased by improving their self-management, speaking and interpersonal problem-solving skills. These are mostly performed by psychiatrists, clinical psychologists and social workers, who are trained in this field (Adams et al. 2000). Peer information and support are tried to be provided through support groups for individuals with SMI and their families within this scope. With family-to-family support programs, voluntary family members are supported and trained about the disease by mental health professionals (psychiatrists, nurses, social workers, and psychologists). Then, these trained family members are also encouraged to train and support other family members (Bademli and Çetinkaya Duman 2011).

There are many evidence-based practices that include psychosocial interventions for individuals with SMI and their families. Studies show that psychosocial interventions significantly reduce the rate of relapse and re-hospitalization of individuals with SMI, and their families' burden and stress levels, and considerably affect both individuals and their families' ability to cope with the disease (Adams et al. 2000, Pitschel et al. 2001, Pharoah et al. 2010, Bademli and Çetinkaya Duman 2011, Yesufu-Udechuku et al. 2015, Asher et al. 2017, Mottaghipour and Tabatabaee 2019). There are many evidence-based practices that

the psychosocial interventions especially for families have the potential to affect individuals with SMI, as well (increasing compliance to disease and treatment, decreasing the frequency of relapse and re-hospitalization). In this respect, it can be said that family interventions are also considered within the scope of psychosocial interventions for individuals with SMI (Mari and Streiner 1994, Pitschel Walz et al. 2001, Pharoah et al. 2010, Yesufu-Udechuku et al. 2015, Mottaghipour and Tabatabaee 2019). From this point of view, in this review study, while the psychosocial interventions applied to individuals with SMI are examined, the studies dealing with psychosocial interventions applied not only to individuals but also to their families are also analyzed.

With the transition to community-based mental health services in Turkey, it can be said that individuals with SMI and their families have an opportunity to benefit from psychosocial services at an increasing rate, besides the medical treatment. In this respect, it is observed that there is an surge in studies dealing with and examining psychosocial interventions applied to the individuals and their families. Similarly, there has been an increase in systematic review studies examining psychosocial interventions for individuals and/or their families in recent years, although they are still limited (Bademli and Çetinkaya Duman 2011, Acar and Buldukoğlu 2013, Çetinkaya Duman and Bademli 2013, Özkan and Eskiyurt 2016). However, it can be said that these studies in the special case of Turkey are limited to describing the overall psychosocial interventions for individuals with SMI and their families, and revealing the results of such studies. Thus, in this study, it was aimed to describe the psychosocial interventions for individuals with severe mental illness and/or their families in Turkey, and to evaluate their results. When starting to study psychosocial interventions, the systematic review question was identified as follows: "What are the psychosocial interventions for individuals with severe mental illness and/or their families in Turkey, and the consequences of these interventions?".

Method

In this study, the databases including Turkish Psychiatry Index, Turkish Medline, Council of Higher Education National Thesis Center, Google Scholar and TR Index were searched to identify the studies conducted with individuals with SMI and/or their families in the period between 2000 and 2019. When making the inquiry, the following keywords were searched: "schizophrenia", "bipolar disorder" (in Turkish as well as in English), "chronic mental disorder", "chronic mental illness", "psychoeducation", "mental social skill training", "group therapy", "social skills training", "psychosocial intervention". Of the publications that were accessed, 36 studies which were published in Turkish and available online in full-text were examined (addressing a psychosocial intervention for the individuals with SMI and/or their families). Case/facts presentations, conference proceedings, paper presentations, and review studies were excluded. As a result of searching the selected keywords for the review, 2404 studies were derived. 1554 of these studies were obtained from Google, 28 from Turkish Psychiatry Directory, 40 from Turkish Medline, 19 from YÖK National Thesis Center, 665

from Google Academy and 98 from TR Directory databases. The studies extracted as a result of the searching were evaluated according to the inclusion and exclusion criteria, and then the non-relevant studies were excluded. These studies were initially evaluated according to their titles, and then 2151 studies which were non-relevant were excluded. 62 studies were taken into consideration in the evaluation after the repetitive studies were excluded from 253 studies obtained as well. The studies included in the evaluation were re-examined by two authors separately according to the criteria of inclusion and exclusion, and a total of 36 studies remained within the scope of the review after the non-relevant studies were excluded at this final stage (Figure 1). The finally obtained results were evaluated and discussed according to the following items: "type of intervention", "type of publication/reference", "sampling", "duration and frequency of intervention", "content of intervention", "measurement tools", and "results".

Results

After the searching and selection process, a total of 36 studies were discussed. 16 of these studies were published research articles, 10 were PhD theses, 6 were master's theses, and 4 were medical expertise theses (dissertation). The descriptive features and results of such studies were discussed under the different titles according to three treatment strategies: (1) psycho-education, (2) original skill training, and (3) problem- or symptom-oriented (treatment).

Psychoeducation

As a result of the examination, it was observed that the majority of psycho-social intervention programs (47.2%) were composed of psycho-education studies (Table 1). The sampling of psycho-education studies carried out included 32.11 (individuals) on average, but a total of 546 individuals were reached. In the studies with 179 sessions in total, the average number of sessions was 16. The shortest psycho-education consisted of two sessions, and the longest psycho-education covered 21 sessions. Out of 17 psycho-education studies, 12 were practiced by nurses, 3 by doctors, 1 by psychologist, and 1 by a treatment team. 9 of the psycho-education studies were conducted with diagnosed individuals, 4 with caregivers and 4 with both individuals and their families.

Psycho-education studies have comprehensive and multidimensional content such as defining the disease, its symptoms, drug treatment, drug use, drug's side effects, other treatments, recognition of early symptoms, coping with stress and anger, changes in the individual and his/her family, and family burden.

The different scales were practiced in psycho-education studies. In the studies conducted with families, the scales such as Giving Care Burden Scale, Psychosocial Adjustment to Illness Self-Reporting Scale, Perceived Family Burden Scale, Emotional Expression Scale (DDÖ), Family Evaluation Scale (ADÖ), Positive and Negative Syndrome Scale (PANNS) were used. On the other hand, in the studies conducted with SMI individuals, depending

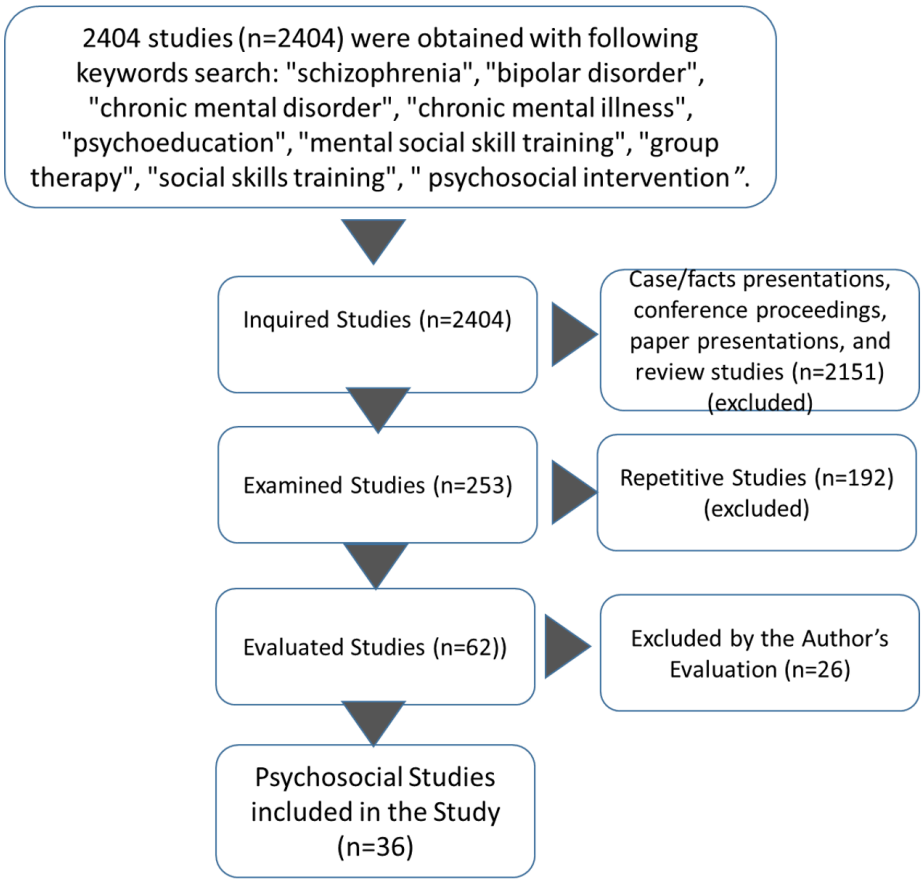

Figure 1. Evaluation flow chart

on the content of the training, the scales such as the Recognition of Emotional Emotion Test, Social Functionality Scale (SİÖ), Bipolar Functionality Scale (BİÖ), Morisky Drug Treatment Compliance Scale, Internalized Stigma in Mental Illnesses Scale (ISMI) were used. It was observed that there were mostly positive changes in psycho-education. Nevertheless Arslantas et al. (2009), Gümüş Camuz (2013) and Arabacı Baysan et al. (2018)'s studies revealed that there was no significant difference.

Original skill training programs

in 8 of the studies under review, the psychosocial interventions providing original skill training were performed (Table 2). The studies in this context include the life skills training (Abaoğlu 2018), Mental Social Skill Training (RUTBE) (Söğütlüve et al. 2017, Yıldız et al. 2018), psychosocial skills training (Barlas Ünsal and Özlem 2010), social skills training and ergotherapy (Ercan Doğu 2019), skills training (Devecive et al. 2008, Elboğa et al. 2019), and group training (Yıldız et al. 2005).

Table 1. Information on psychoeducation studies for individuals with SMI and their families

Reference Type of Publication	Sampling	Duration and Frequencyofthe Intervention	Content of the Intervention
(Arabacı Baysan et al. 2018) Journal Article	N=40 KBV (20 KG, 20 DG	Nurse, 8-week session, half a day every week.	Information about chronic mental disorders, symptoms, treatments, prevention of relapse; drug use, side effects, effects of chronic mental disorders on the individual and family, coping with stress and anger.
(Aşık, 2016) PhD Thesis	N=42 ŞB (21 DG, 21 KG)	Nurse, 8 sessions, 60 min. once a week.	Psychoeducation to recognize and express emotions.
(Çabuk, 2014) Master's Thesis	N=60 (30 DG, 30KG) SB ve BV (30	Nurse, 8 sessions, 45-60 min.	Training program on schizophrenia disease, its treatment, early symptoms of the disease, communication skills, stress coping and problem solving skills.
(Bulut et al., 2019) Journal Article	N=60 ŞBV (30 Dg, 30 KG)	Nurse, 8 sessions, 2 times a week, 45-60 min.	Signs and symptoms of schizophrenia, course of the disease, causes, diagnostic tests and measurement, lifestyle changes, treatment options, possible outcomes of the treatment, drug effects and side effects, therapeutic strategies, adaptive coping methods, potential compliance problems, early warning signs of relapse, developing self-care responsibility, communication, coping skills, social skills training, stress management, providing social support, problem solving training, crisis management.
(Sönmez, 2009) Medical Dissertation	N= 38 ŞB (only DG)	Doctor, 14 sessions, once a week, 90 min.	There is no detailed information on the content of the training.
(Arslantas et al. 2009) Journal Article	N=17 ŞBV (only DG)	Nurse, 16 sessions, 16 hours for 2 weeks.	General information about schizophrenia, coping with symptoms of schizophrenia, coping with stress, goals of drug therapy, its side effects, and key issues to be considered.
(Altun Dikyar, 2014) Expertise Thesis	N= 30 BB (only DG)	Medical Doctor, in groups of about 10 people, 2 sessions on 3 different days, 180 min.	Structured psychoeducation program
(Gümüş Camuz, 2013) PhD Thesis	N=78 BB (37 DG, 41 KG)	Nurse, 4 sessions, four sessions once a week, 45-60 min.	Information about the disease, messenger symptoms and emergency plan to prevent disease recurrence, evaluation of drug effects and side effects, communication and problem solving skills.
(Çuhadar and Çam, 2011) PhD Thesis	N=47 BB (24 DG, 23 KG)	Nurse, 7 sessions, 60-90 min.	Information about the disease and disease process, information about stigmatization, recognition of internalized stigma, training the skills of coping with internalized stigma.

Measurement Tools	Results
Caregiver Burden Scale (BVYÖ), Psychosocial Compliance to Disease Self-Reporting Scale (PAIS-SR)	In both the implementation and control groups, there was no statistically significant difference between pre-and post-psychoeducation mean scores of BVYÖ and PAIS-SR subscales.
Facial Emotion Identification Test (YDTT), Facial Emotion Discrimination Test, and Social Performance Scale (PSP)	In the initial measurement after the psychoeducation program, a statistically significant difference was found between the intervention and control groups in terms of the mean scores of YDTT and PSP, but this difference disappeared after 3 months.
Perceived Family Burden Scale	Whereas there was no change in the objective burden score of caregivers after psychoeducation in the study group, there was a significant decrease in subjective burden and total burden scores.
Emotional Expression Scale (DDO), Positive and Negative Syndrome Scale PANNS	In the study, the following results were observed: -Emotional expression scores of caregivers participating in training decreased, -Emotional expression scores of the caregivers in the control group who were not intervened, increased, -PANSS scores of the caregivers and the patients they care for decreased.
PANSS, Schedule for Assessing the Three Components of Insight, Disability Assessment Schedule (WHO-DAS-II), SİÖ, and Quality of Life Scale for Schizophrenia Patients (ŞYNÖ)	After psychoeducation, it was observed that disease findings were less, disease and treatment insight was higher, disability was lower, quality of life and social functioning were better.
Emotion Expression Scale (DDÖ), Family and Friend Social Support Scales, State-Trait Anxiety Scale (STAI-I), Beck Depression and Anxiety Scales, Clinical Global Impression (KGI), Short Psychiatric Evaluation (BPRS), Calgary Schizophrenia Depression (CSD) Scale , Positive and Negative Syndrome Scale (PANSS)	There was no significant difference between the initial clinical scores of the patients and the clinical scores three months after the training program. There was no improvement in the emotional mood levels of caregivers with training, but it was found that at the end of the 3rd month, there was a tendency to decrease, even though the level did not reach statistical significance.
Bipolar Disorder Functionality Scale, Whoqol-Bref YKÖ, Multidimensional Perceived Social Support Scale, COPE Coping Attitudes Scale, Morisky Drug Compliance Scale, Young Mania Rating Scale, Hamilton Depression Rating Scale Before training, and 3 months after training	It was observed; -Significant increase in patients' quality of life, psychological health and social relations, -Positive development in feeling of stigma, introversion, domestic relations, -İncrease in functionality, -Rise in perceived social support, especially in the family subscale, -Significant reduction in religious- and emotional-oriented coping strategies.
Morisky Drug Treatment Compliance Scale, Bipolar Disorder Functionality Scale, and WHOQOL-BREF YKÖ	It was determined that individual psychoeducation did not have an effect on disease recurrence rates, quality of life, functionality and drug compliance in bipolar disorder patients at 12 months
Internalized Stigma Scale in Mental Illness (RHİDÖ), Bipolar Disorder Functionality Scale (BB-İ), Satisfaction Determination Form	The internalized stigma score mean of the patients in the experimental group who participated in psychoeducation was significantly lower than the patients in the control group.

(Harkın, 2009) Master's Thesis	N=63 BB (30 DG, 33 KG)	Nurse, 6 sessions, 90-120 min.	Definition, causes and symptoms of bipolar disorder; treatments applied in bipolar disorder and the importance of compliance with treatment; drugs used in bipolar disorder, their effects and side effects; recognizing and monitoring messenger symptoms in bipolar disorder; coping with stress, problem solving strategies, and evaluation.
(Kurdal, 2011) Master's Thesis	N= 80 BB (40 DG, 40 KG)	Nurse, 21 sessions, once a week, 45 min.	General information about Bipolar Disorder, pregnancy and genetic counseling, alternative therapies, risks associated with discontinuation of treatment, risks of alcohol and substance use, what should be done when a new attack is detected, regularity of habits, stress control techniques, problem solving strategies.
(Öksüz, 2010) PhD Thesis	N=60PBA (30 DG, 30 KG)	Nurse, 9 sessions, 90 min.	Family's disease experiences, general information on the disease, drug treatment, side effects of drugs, early symptoms, communication with the patient.
(Tezcan, 2017) Expertise Thesis	N=60 BB (30 DG, 30 KG)	Doctor, 16 sessions, once a week, 90 min.	General information about the disease, symptoms, compliance with treatment, early symptoms, pregnancy, alcohol, family psychoeducation, recovery
(Özkan, et l. 2013) Article	N=62 ŞB+ŞBV (32 DG, 30 KG)	Nurse, 8 sessions, 25-30 minutes with patients, 35-50 minutes with caregivers, 3 times a week.	What is Psychosis / Schizophrenia?, What are the causes of schizophrenia?, When does schizophrenia begin and how does it occur? What are the symptoms of schizophrenia?, Are people with schizophrenia aggressive?, The diagnostic process, How is schizophrenia treated? Antipsychotic drug treatment, psychosocial treatments, some issues to be considered, Handbook for Schizophrenia Patients was used. During the six months after discharge, a regular and average 15 minutes phone call was made every week. What is Psychosis / Schizophrenia?,
(Yiğit, 2015) Master's Thesis	N=82 ŞBA (44 DG, 38 KG)	Psychologist, 8 sessions, 120 min.	Communication skills, problem solving, anger control
(Yıldırım, 2014) Master's Thesis	N=40 BB outpatient (only DG)	Nurse, 21 sessions, 45-60 min.	Information about the disease and treatment, alternative therapies, problems that may arise due to the cessation of treatment, the effect of alcohol and substance use on the disease, early detection and control of attacks, methods of coping with stress, and problem solving skills, etc.
(Yurtsever, et al., 2001) Article	N= 80 DBB (40 DG, 40 KG)+ 80 DBA (40 DG, 40 KG) =160	The trainer is not clear, the participation of individuals and their families together, 5 sessions of 2 hours each.	Training on the causes and symptoms of disease, and medication and its side effects via using role playing, monodrama, psychodrama, behavioral repetitions.

Psychotic Disorder: PB, Individual with Schizophrenia Disease: ŞB, Individual with Bipolar Disease: BB, his/her family / caregivers, respectively: BA / BBV, Mood disorder / Bipolar individual: DB, his/her family: DBA, Caregivers of individuals with SMI: BV, Families/caregivers of individuals with schizophrenia disease, respectively: ŞA / SBV, Families of individuals with psychotic disorder: PBA, Experimental group: DG, Control group: KG.

	Medical Treatment Compliance Rate Scale (MARS), Neuroleptic Treatment Participation Scale (ANT), McEvoy Treatment Compliance Monitoring Form	While the difference between the mean scores of the MARS and ANT in the pre-test of the patients in the experimental and control groups was statistically insignificant ($p > 0.05$), there was an increase for the experimental group after psychoeducation (post-test) and the difference between the groups was statistically significant ($p < 0.05$).
	BB-İ	Psychoeducation was shown to be effective in increasing the functionality levels of patients with bipolar disorder.
	DDÖ and Family Evaluation Scale	While the emotional expression decreased, it had a positive effect on family functionality.
	SCID-I (Structured Clinical Interview for DSM-IV Axis I Diagnoses), SCID-II (Structured Clinical Interview for DSM-III-R Axis-II Disorders), Overall Assessment of Functionality Scale (IGD), Clinical Global Impression Scale (KGĠ) , Functionality Scale in Bipolar Disorder (BBI), Young Mania Rating Scale (YMRS), Hamilton Depression Rating Scale (HAM-D), Three Components of Insight Rating Scale (ABAS), Morisky Treatment Compliance Scale.	For the patients receiving psychoeducation, it was found; -no change in symptoms of depression and mania, -increased overall functionality, insight, and treatment compliance, -improvement in stigma, introversion, daily functionality, For the control group, it was found; -increase in symptoms of depression and mania, -decrease in the fieds of insight, treatment compliance, friend relationships, social relations, daily functionality.
	Medical Treatment Compliance Rate and Social Functioning Grading Scales, Emotional Expression, Beck Depression, and Zarit Family Burden Scales. Patients in the experimental and control groups before training, after training (during discharge) and after six months of telephone monitoring.	It was determined that the mean scores of compliance and social functionality of the patients in the experimental group after treatment and after telephone monitoring increased, and the difference between the mean scores before and after training and after telephone monitoring was significant. The difference between the mean scores of treatment compliance and social functionality of the patients in the experimental and control groups was found to be important after the training and after the telephone monitoring.
	Positive Symptoms Rating Scale (SAPS), Negative Symptoms Rating Scale (SANS), Expressed Emotion Level (DDD), DDÖ, Information Scale about Schizophrenia, Trait Anxiety Scale.	It was shown that this had a positive effect on the level of knowledge and emotional expression of patients' relatives about schizophrenia.
	SF 36 Short Form YKÖ, Morisky Drug Treatment Compliance Scale	In treatment compliance, a statistically significant increase was found between the mean scores of treatment compliance before psychoeducation and 3rd month after psychoeducation.
	Disease Recognition Scale, Family Attitude Scale, Medication Side Effects Knowing Scale, Depression Scale, Mania Scale. In addition, the scale and questionnaire regarding "Knowing the Name of the Disease, Knowing the Symptoms of the Disease, Knowing the Drugs Used and Side Effects, Complying with the Treatment" were used.	Both DBs in DG and DBAs reached a higher level of knowing than the control group in terms of "knowing the name of the disease" "knowing the symptoms of the disease" "knowing the drugs used" "knowing the side effects of the drugs". In DG, compared to KG, the depression and mania scores decreased and treatment compliance increased in both DBs and DBAs.

In the psychosocial intervention studies using the original skills training strategy, a total of 285 individuals were reached (average 35.62). In the studies with 237 sessions in total, the average number of sessions was 29.62. The shortest training took three sessions, while the longest training consisted of 72 sessions. Out of 8 studies, 3 of which under the supervision of the treatment team, 2 of them by the therapist, 1 by the doctor and 1 by the psychologist; the studies were practiced by volunteers and families together. All skill trainings were performed with SMI individuals.

Skill trainings covered the sessions to gain skills in areas such as personal management, social skills, leisure time use, communication skills, problem solving skills, interpersonal relationship skills, coping with disease symptoms. The applied mental social skills training (RUTBE) was a structured program designed for individuals diagnosed with schizophrenia (Yıldız 2011). This program was mostly aimed at acquiring skills such as communication skills, problem-solving skills, psychosis and anti-psychotic drugs, evaluating and monitoring treatment, recognizing and coping with drug side effects, recognizing and coping with warning signs and persistent symptoms, alcohol and drug avoidance, support sessions, increasing social and entertaining activities (Söğütlü et al. 2017). A significant difference was found in the scores obtained from the Schizophrenia Patients' Quality of Life Scale used in both studies in which RUTBE was practiced. This showed that the applied training was effective.

The studies carried out by ergotherapists, who have started to be effective in team-works in the field of mental health in recent years, were also evaluated within the scope of skills training (Abaoğlu 2018, Ercan Doğu 2019). In both studies, it was found that they contributed positively to recovery in diagnosed individuals.

Some of the studies examined within the scope of skill trainings cover evaluating the services delivered (Arslan et al. 2015, Çakmak et al. 2016, Elboğa et al. 2019). In two of these studies, the activities such as improving hand skills, good morning meetings, group works, watching training videos were practiced. These activities were found to create positive changes for the individuals. In the study of Arslan et al. (2015), the consultancy service was delivered, the mental training group was applied to families, and the individuals were arranged to work for three months. As a result of this study, it was revealed that the severity of symptoms and frequency of hospitalization decreased, and the drug compliance, level of insight, quality of life and social functionality increased.

Another important approach used in skill training is the club-home rehabilitation program implemented by Yıldız et al. (2003). In this study, supportive therapy, daily life activities, occupational therapies, and sportive, cultural, entertaining and social activities were applied for 14 diagnosed individuals with schizophrenia. As a result of this program, a positive change was observed in the symptoms, clinical status and social functionality of individuals. In order to evaluate skill trainings, the scales regarding symptoms of the disease, quality of life, daily life activities, and the evaluation forms on the applied trainings were used. It was observed that there were positive changes in all studies.

Problem- or symptom-oriented psychosocial ınterventions

apart from psychoeducation and skill training, other psychosocial intervention programs were discussed under this heading (Table 3). These programs can be listed as follows: family-oriented therapy (Karaaslan 2014), family-to-family support program (Bademli and Çetinkaya Duman 2011, Yıldırım et al. 2013), treatment compliance program (Budak 2019), holistic cognitive model (Maçkalı 2017), cognitive behavioralist group intervention (Mortanve et al. 2011), interpersonal relations therapy (Durmaz 2015), psychoeducation treatment group (Çetinkaya Duman et al. 2006), multi-dimensional psychosocial intervention program (Arslanve et al. 2015), occupational terapy activities (Çakmak et al. 2016), club-home rehabilitation program (Yıldız et al. 2003).

In these studies, a total of 409 individuals were reached (average 37.18). For the studies covered 141 sessions in total, the average number of sessions were 12.81. The shortest program took three sessions, while the longest program consisted of 32 sessions. Out of 11 studies, 6 were practiced by nurses, 3 by doctors and 2 by psychologists. Six of these programs were conducted with the diagnosed individuals, three with caregivers, and two with both the diagnosed individuals and their families.

The study of Karaarslan (2014) was a family-oriented therapy study involving the diagnosed adolescents with bipolar disorder and at least one of their parent. Family-oriented therapy consisted of the following stages: psychoeducation interviews, training to improve communication skills, problem solving training, and conclusion. These stages were carried out for 12 sessions. The content of psychoeducation interviews included the information about symptoms, differential and additional diagnosis, disease progression, treatment and personal management of the disease. The module for developing communication skills was related to the skills such as giving positive feedback, active listening, openness to communication, and making positive requests to change the behavior of others. In this module, role playing technique was mostly applied rather than giving lectures. In addition, by assigning homeworks to young individuals and their families, the learnt information was tried to be permanent. Problem solving training, on the other hand, focused on helping the family to create action plans on the problems that they might encounter by guiding the family, similar to the communication training. Finally, the implementation was concluded by taking the opinions of the family and reviewing the missing points. The findings of the study showed that the family-oriented therapy provided a decrease in the symptoms and severity of the disease, and had positive effects on the quality of life and family functionality (Karaaslan 2014).

Another study considered in this context was family-to-family support programs. The purpose of these programs was to arrange a professional training to the families of individuals with severe mental illness, and then these trained families to train other families later. The aim was that the families with similar problems supported each other. In the review, it was seen that family-to-family support programs were implemented in two of 36 studies. Acoording to the findings of both studies, the participation of families in this program was found to have positive effects on the areas of coping with stress and family burden (Bademli

Table 2. Information on original skills training programs for individuals with SMI and their families

Psychosocial Intervention Type	Reference Type of Publication	Sampling	Duration and Frequency of the Intervention	Content of the Intervention
Life skills training	(Abaoğlu, 2018) PhD Thesis	N=32 ŞB (15 DG, 17 KG)	Ergo-therapist, 16 sessions, 2 days a week.	Personal Management, Social Skills, Work Skills, Constructive Use of Free Time
Mental social skills training (RUTBE)	Söğütlü et al. (2017b) Journal Article	N=60 ŞB (30 DG, 30 KG)	Medical Doctor / Psychologist, 18 sessions, once a week, 45 min	Communication skills, problem-solving skills, psychosis and antipsychotic drugs, evaluating and monitoring treatment, recognizing and dealing with drug side effects, recognizing and dealing with warning signs, recognizing and coping with stubborn symptoms, avoiding alcohol and drugs, support sessions, increasing social and entertaining activities.
Mental social skills training - Metacognition training	Yıldız et al. (2018) Article	N=20 Outpatient ŞB (Only DG)	Two experienced trainers who had previously managed the RUTBE and UBE groups. RUTBE training for one of the 2 groups of 10 people, and Metacognition training for the other, once a week 40-50 minutes, 20 weeks, total 20x2 = 40 sessions.	Sessions aiming to improve the interpersonal relationship skills of patients, increase their life qualities and functionality such as daily activity levels, reduce symptom severity and improve insight.
Psychosocial skills training	Barlas Ünsal and Özlem (2010) Article	N= 30 Outpatient ŞA (15 DG, 15 KG)	3 sessions - no further information provided.	Psychosocial Skill Training Program which were developed based on cognitive behavioral theories and techniques was implemented.
Social skills training and ergotherapy	Ercan Doğu (2019) PhD Thesis	N= 60 Outpatient ŞB (30 Dg, 30 KG)	Ergo-therapist; Social skills training consisted of 10 sessions lasting 50 minutes once a week. Together with the social skills training, the ergo-therapy program consisted of 16 sessions of 50 minutes once a week.	The Ergo-therapy Program covered 4 submodules: basic communication skills, activity planning skills, problem solving skills, and recreational skills. The Social Skill Training Program consisted of 2 sub-modules: basic communication skills and problem solving skills.
Skill training	Elboğa et al. 2019 Article	N= Outpatient 39 ŞB (23), BB (15) ŞA (1) (only DG)	The trainer is not clear; at least 3 days a week, at least 2 hours a day, 6 months of training.	Watching training videos, drawing, playing a role in group work, ensuring that they complete the given tasks and participate in collective social activities.

Measurement Tools	Results
Positive and Negative Syndrome Scale (PANNS), Clinical Global Impression Scale, Independence Index in Katz Daily Life Activities, Lawton and Brody's Auxiliary Daily Life Activities Index, Short Functionality Assessment Scale, Social Functionality Scale, Occupational Rehabilitation Survey, and 24-Hour Time Usage Diary.	Compared with the control group, it was observed that there was a higher increase in the motivation levels of individuals in the intervention group in terms of the frequency distribution.
PANNS, Calgary Schizophrenia Depression Scale (CŞSÖ), Three Components of Insight Assessment Scale (İÜBDÖ), Scale of Incompatibility to Drug Treatment in Patients with Psychotic Disorder (İTUDÖ), Quality of Life Scale of Schizophrenic Patients (ŞHYNÖ), and Social Functioning Scale (SİÖ)	When the scale scores of the two groups were compared at the beginning and end of RUTBE, no significant difference was found in the PANSS positive symptoms subscale score. A significant decrease was found in PANSS negative symptoms subscale, general psychopathology subscale, and PANSS total score. In the study group, CŞDÖ, İÜBDÖ, İTUDÖ, ŞHYNÖ, SİÖ scores significantly improved after the training.
Positive and Negative Symptom Scale (PNBÖ), Clinical General Impression-Severity (KGŞ-Ş), Overall Assessment of Functionality (IGD), Life Qualification Scale in Schizophrenia Patients (ŞYNÖ), Cognitive Assessment Interview (BDG) It was carried out before training (pre-test) and within two weeks after training (post-test).	After training, significant changes were observed in terms of psychopathology, cognitive and social functionality in both groups of ŞB ($p < 0.05$). In terms of effect level, there was no difference between the groups. It was shown that two different training programs targeting improvement in schizophrenia had a positive effect on psychopathology and functionality.
Information Form, "Pre-test" and "Post-test" Evaluation Form included in the Psychosocial Skills Training Program. It was applied before training (pre-test), after training and one month after training (post-test).	It was also observed that after the training, patients accepted their illnesses, improved compliance, used their communication skills better, expressed their illnesses and problems related to drug side effects. Compared to KG, the difference in post-training ($p = 0.000$) and one-month controls ($p = 0.003$) for DG was also significant.
The following methods were applied to both individuals in the intervention and control groups, before and after the intervention and during 6 months monitoring period: Sociodemographic Data Form, Brief Psychiatric Evaluation Scale (KPDÖ), Negative Symptoms Rating Scale (NBDÖ), Calgary Schizophrenia Scale (CŞDÖ), Canada Activity Performance Measurement (KAPÖ), SİÖ, Communication Skills Scale (İBÖ), Revised Problem Solving Inventory-Short Form (SSÇE-GK), Whoqol-Bref YKÖ (WHOQOL-BREF-TR), Social Integration Survey (TBA), and the Montreal Cognitive Assessment (MOBİD).	Two programs applied together were found to cause; -decrease in psychiatric symptoms, depressive symptoms and negative symptoms, -improvement in cognitive skills, social functionality, problem solving and communication skills, -increase in activity performance, social participation and quality of life, In the follow-up, together with social skills training, for the ergotherapy group, it was found that the improvement in clinical symptoms, activity performance, social functionality, communication skills, problem-solving skills, social participation, and quality of life continued.
Montreal Cognitive Assessment Scale (MoCA), Lawton-Broody Instrumental Daily Living Activities Scale (EGYA) It was applied at the beginning of the study and at the end of 6th month.	A statistically significant increase was observed in the scores measured at the end of 6th month. It was determined that applied skill training improved cognitive functions and led to positive changes in daily life activities and helped them to be more active in social relations.

Mental social skills training	(Yıldız et al. 2005) Article	N= Outpatient 25 ŞB (started), 19 ŞB (completed) and their families (ŞA) (only DG)	-The trainer is not clear. - For ŞBs, two sessions of 45 minutes once a week for about 6-8 months -For ŞAs, 2 times 1.5 hours once a week for about 6-8 months - every 15 days for 2 months, -then the training continued with monthly support sessions.	Communication, drug therapy, information about the disease
Psychosocial skills training	(Deveci et al. 2008) Article	N= AT 22 ŞB (started), 19 ŞB (completed) (Only DG)	Doctor, 3 training groups consisting of 6-8 SBs, each group lasted for about 6 months	Training was provided on the subjects such as communication skills, problem solving skills, understanding the disease, drug treatment, and coping with stubborn symptoms, via using active learning methods.

Psychotic Disorder: PB, Individual with Schizophrenia Disease: ŞB, Individual with Bipolar Disease: BB, his/her family / caregivers, respectively: BA / BBV, Mood disorder / Bipolar individual: DB, his/her family: DBA, Caregivers of individuals with SMI: BV, Families/caregivers of individuals with schizophrenia disease, respectively: ŞA / SBV, Families of individuals with psychotic disorder: PBA, Experimental group: DG, Control group: KG

2012, Yıldırım et al. 2013).

The treatment compliance program was another applied psychosocial intervention program. The content of the study conducted by Budak (2019) covered the following titles: meeting and sharing of emotions, introduction to the disease, treatment-related problems, past experiences, patient's information and beliefs on treatment, future plans and their evaluation. It was determined that the individuals who participated in the study increased their compliance to treatment.

The holistic cognitive model was another approach practiced. The content of this program included identifying life goals, recognizing different emotional states, grading the intensity of emotion, controlling emotions, and coping with difficulties in interpersonal relationships. It was observed that the applied program had a clinically significant effect (Maçkalı 2017).

The cognitive behavioral group intervention applied by Mortan et al. (2011) to deal with auditory hallucinations led to a significant reduction in adverse effects and negative symptoms caused by hallucinations for diagnosed individuals. Another study was the interpersonal relationships psychotherapy applied to caregivers. In this context, caregivers were trained on general information about the disease, difficulties in the caregiving process, recommendations for solutions to problems, treatment, treatment compliance, communication, coping with stress and anger. As a result of the training, it was concluded that self efficacy increased and care burden eased (Durmaz 2015).

Discussion

The results of this study, which is the first systematic review to examine psychosocial interventions for both individuals with SMI and their families, reveal the positive effects

RUTBE Evaluation Form (pre-test, post-test evaluation forms)	There was an increase in the information, communication, drug treatment, coping with symptoms and socialization skills of ŞAs. Besides, ŞAs attempted to established an organization that would provide solidarity environment for them and ŞBs, and then they successfully accomplished this.
Positive Symptoms Evaluation Scale, Negative Symptoms Evaluation Scale, Depression Scale in Calgary Schizophrenia, Three Components of Insight Rating Scale, ŞYNÖ and Suicide Probability Scale.	Although there was a significant decrease in Positive Symptoms Rating Scale ($p = 0.004$), Negative Symptoms Rating Scale ($p = 0.001$), Calgary Schizophrenia Scale ($p = 0.001$); a significant increases in the Scale of Assessment of Three Components of Insight ($p < 0.0001$) and Schizophrenia Patients' Quality of Life Scale ($p < 0.0001$) were found. A statistically insignificant decrease in Suicide Probability Scale scores. ($p = 0.06$) was found.

of psychosocial interventions on the individuals and their families in line with the findings obtained in the meta-analysis studies in the field.

It was observed that the majority of the participants in the studies under review consisted of individuals with schizophrenia disease and their families. This suggests that psychosocial interventions in the past initially started for individuals with schizophrenia and their families, but today, it is still unchanged, and the psychosocial interventions for individuals with psychosis and bipolar disease and their families are stil limited. Similar to the findings of this study, it is revealed in the literature that psychosocial interventions are mostly performed with individuals with schizophrenia disease (Mottaghipour and Tabatabaee 2019). In this respect, it can be said that there is a need for the development of psychosocial interventions for individuals with bipolar disease and their families.

When the content of the psychosocial interventions applied is examined, it can be said that the purpose of such interventions is mainly aimed at increasing the level of knowledge of the individuals and their families about the disease. In the literature, it is also pointed out that the importance and necessity of psychoeducation studies are emphasized by stating that individuals and their families generally have little information about the disease, and that the most important need in coping effectively with the disease is (acquiring) the information in this respect (Pitschel Walz et al. 2001, Pharoah et al. 2010, Mottaghipour and Tabatabaee 2019).

In the 36 studies under review, it was observed that the majority of psychosocial intervention programs (47.2%) covered psychoeducation studies and these studies had positive effects for individuals with SMI and their families. Similarly, the programs in which both mental training and skills development were applied together (namely, RUTBE) also

Table 3. Information on problem- or symptoms-oriented psychosocial interventions for individuals with SMI and their families

Psychosocial interventionType	Reference Type of Publication	Sampling	DurationandFrequency of the Intervention	Content of the Intervention
Family-oriented therapy	(Karaaslan, 2014) Medical Dissertation	N= 14 (8 DG, 6 KG) 12-18 age adolescent BP and BA	Doctor, 12 sessions.	Family-oriented therapy
Family-to-family support program	(Bademli, 2012) PhD Thesis	N=46 ŞBV (22 DG, 24 KG)	Nurse, 8 sessions, 120 minutes a day	Schizophrenia disease, its symptoms, its treatment, communication with patients, coping with stress.
Treatment compliance program	(Budak, 2019) Master's Thesis	N=61 DB (31 DG, 30 KG)	Nurse, 3 sessions, 60-90 min.	Meeting and sharing of emotions, introduction of the disease, treatment-related problems, past experiences, patient's knowledge and beliefs about treatment, future plans and their evaluation.
Holistic Cognitive Model	(Maçkalı, 2017) PhD Thesis	N= 10 DB (only DG)	Psychologist, 8 sessions, 90 min once a week.	Setting life goals, recognizing different moods, rating the intensity of emotion, controlling emotions, coping with difficulties in interpersonal relationships
Multidimensional psychosocial intervention program	(Arslan et al. 2015) Journal Article	N= 60 ŞB (Only DG)	Nurse/ Psychologist, 14 sessions.	30 minutes consulting for the first 6 months, a mental training group that lasts 14 weeks to families, ensuring patients' work for at least 3 months.
Occupational (terapy) activities	(Çakmak et al. 2016) Journal Article	N=91 KB (48 DG, 43 KG)	Doctor/ Treatment Team, for 2 hours once a week.	Handcraft, painting, sports, and good morning meetings in which patients evaluate themselves and other patients.
Cognitive behavioral group intervention	(Mortan et al. 2011) Journal Article	N= 12 ŞB (7 DG, 5 KG)	Doctor, 10 sessions.	A cognitive-behavioral group (BDT) intervention to cope with auditory hallucinations
Interpersonal relationships therapy techniques, and psychoeducation	(Durmaz, 2015) PhD Thesis	N= 21 ŞBV (14 DG, 7 KG)	Nurse, 12 sessions, 45 min.	General training about schizophrenia, difficulties experienced by the family member while giving care, reccommendations for solutions to problems experienced during the care process, treatment in schizophrenia, problems in compliance with treatment and solution suggestions, care burden and self-efficacy, communication, coping with stress and anger

	Measurement Tools	Results
	Affective Disorders and Schizophrenia Interview Schedule for School Age Children -Present and Lifetime Version (K-SADS-PL), Depression Rating Scale for Children (DRSC), Young Mania Rating Scale (YMRS), Mood Severity Index (MSI), General Evaluation for Children Scale, Clinical Global Impression Scale, YKÖ for Children, Family Assessment Scale, Beck Depression Scale (BDS)	The symptoms of BB and disease severity showed that the cases had positive effects on quality of life and functionalities, and family functionality.
	General Health Questionnaire (GSA) and Stress Coping Styles Scale (SBÇTÖ)	It was found that this program had positive results on coping methods of ŞBVs and their mental health.
	Morisky Treatment Compliance Scale, Self Efficacy-Adequacy Scale, Coopersmith Self-Esteem Inventory (Adult Form)	The TUP applied to patients with İUDB for the first time in Turkey was determined to improve the compliance of patients.
	Beck Depression Inventory, Psychological Well-Being Scale, and Life Satisfaction Scale	The group-based intervention of the Holistic Cognitive Model was found to have a clinically significant effect.
	Bakırköy Chronic Psychiatric Patient Rehabilitation Form, Positive and Negative Syndrome Scale, Morisky Adjustment Scale, ŞYNÖ, Three Components of Insight Rating Scale, SİÖ, Disability Assessment Chart	Both the measurement at the end of the program and in the third year, compared to the measurement made before the program, the followings were found statistically significant; -Decrease in symptom severity, -Increase in drug compliance and insight, decrease in the frequency of hospitalization, -Increase in social functionality and quality of life.
	Interpersonal Functionality Scale (KİÖ), and Individual and Social Performance Scale (BSPÖ)	The results showed that the use of occupational (terapy) activities activities in treatment provides a significant improvement in BSPÖ in both groups, especially in non-psychosis psychiatric patients compared to the control group, and the majority of patients hospitalized in psychiatric clinics provide positive feedback to such interventions.
	SAPS (Scale for Assessment of Positive Symptoms), SANS (Scale for Assessment of Negative Symptoms), Problem / Symptom Assessment Scale, Schizophrenia Information Scale, Hamilton Depression Scale, Hamilton Anxiety Scale, Beck Depression Scale, Beck Anxiety Scale, Beck Hopelessness Scale, and Rosenberg Self-Esteem Scale	For the BDT group, it was observed a significant decrease in the frequency and severity of hallucinations, delusions, distress caused by auditory hallucinations, duration in hallucinations, negative symptoms and anxiety level. However, there was no significant difference between the measurement before and after the intervention for the control group.
	Interpersonal Relations Inventory, Self Effectiveness Scale, and Care Burden Scale	Interpersonal Relations Psychotherapy techniques which were applied with the psychoeducation together were found to be more effective in increasing self-efficacy and reducing the burden of care than the group applied to the psychoeducation only, and the control group.

Family-to-family support program	(Yıldırım et al. 2013) Article, semi-experimental	N= 34 outpatient ŞA member (Only DG)	Nurse, 12 sessions, 2 hours once a week.	A volunteer family member who played a key role in the life of ŞB was trained to cover issues such as sharing emotions, mental disorders, schizophrenia, sharing experiences and difficulties, medications and side effects, treatment methods, communication skills, impact of the disease on family life, and developing problem solving skills, etc.. In addition to the training, a booklet covering the content of the program was also provided.
Club- Home rehabilitation program	(Yıldız et al. 2003) Article	N= 14 outpatient ŞB	Practiced by volunteers and families under the supervision of psychologist for 8 months, 1 day per week.	The program includes supportive therapy, daily life activities occupational therapies, sports, and cultural, fun and social activities.
Psychoeducational treatment group	(Çetinkaya Duman et al. 2006) Article	N= 46 inpatient KRB (only DG)	3 sessions per week, for two weeks, 6 sessions of about 35 minutes each, 10 months of implementation period in total.	Tutorial in each group, repeating with question-answer method, reading the collar sample for the session and then checking that it was understood by question and answer, learning activities such as role playing, assigning homework at the end of each session to ensure that what were learned about the subject was transformed into behavior and continuity.
* Metacognition Training	(Yıldız et al. 2018) Article	N=20 outpatient ŞB (Only DG)	By 2 experienced trainers, RUTBE training for one of the 2 groups of 10 individuals and metacognition training for the other, 40-50 minutes once a week, 20 weeks, 20x2 = 40 sessions in total.	Citation forms, immediate conclusion error, belief invariance, reason theory and social cognition deficiencies, excessive trust in memory errors, depression, and lack of self-esteem.

*Since both mental social skills training and metacognition training were applied together in this study, the mental social skills training dimension is shown in Table 2.
Psychotic Disorder: PB, Individual with Schizophrenia Disease: ŞB, Individual with Bipolar Disease: BB, his/her family / caregivers, respectively: BA / BBV, Mood disorder / Bipolar individual: DB, his/her family: DBA, Caregivers of individuals with SMI: BV, Families/caregivers of individuals with schizophrenia disease, respectively: ŞA / SBV, Families of individuals with psychotic disorder: PBA, Experimental group: DG, Control group: KG

had positive effects for individuals and their families. In line with the findings of this study, systematic review and meta-analysis studies in the literature also show that as an intervention strategy, which is often used in the treatment of mental illnesses, the psychoeducation has important effects on decreasing the frequency and duration of hospitalization of individuals with SMI, increasing their compliance to treatment, and increasing their social functionality and quality of life via reducing the symptoms and relapse due to diseases (Xia et al. 2011, Zhaove et al. 2015, Mottaghipour and Tabatabaee 2019). In these studies, it was shown that psychoeducation had positive effects on easing the care burden of families, improving their coping skills, and increasing their quality of life and family functionality (Mari and Streiner 1994, Pitschel Walz et al. 2001, Pharoah et al. 2010, Yesufu-Udechuku et al. 2015, Mottaghipour and Tabatabaee 2019). The number of sessions and content of psychoeducation programs under review can be said to be similar to the psychoeducation

	Disease Information Form (HBF), Perceived Family Burden Scale (AAYÖ), Self-Efficacy Scale (ÖYÖ) Pre-test (before training) - post-test (1 month after training)	There was a significant decrease in the objective (p = 0,000), subjective (p = 0.030) and total (p = 0.005) scores of AAYÖ, and a significant increase in the scores of ÖYÖ (p = 0,000). After the training, the disease information of the families increased significantly in all questions. The program was found to be effective in reducing the need and burden of families and increasing their self-efficacy perception.
	Quality of Life Scale for Schizophrenic Patients (ŞYNÖ), Positive and Negative Syndrome Scale (PANSS), SİÖ, and IGD. The scales were applied at the beginning and end of the program.	There was a positive change in patients' quality of life, clinical status including positive and negative symptoms, and social functionality (p <0.001).
	The list of questions created for the content of the program It was applied before and after the training.	There was a significant difference (P <0.05) in the pre-test and post-test scores. The differences between the information scores for sub-sections (managing patients' illnesses, medicines, messenger symptoms of disease, and developing emergency plans) before and after the intervention were also significant (p = 0.001). No significant difference was found according to gender and diagnosis groups (P <0.01).
	PNBÖ, KGİ-Ş, İGD, ŞYNÖ for Schizophrenia Patients, Cognitive Assessment Interview (BDG). It was applied before training (pre-test) and within two weeks after training (post-test).	-Significant change for ŞB in both groups in terms of psychopathology, cognitive and social functionality after training (p <0.05). -There is no difference between the groups in terms of the effect level. -It was shown that two different training programs targeting improvement in schizophrenia had a positive effect on psychopathology and functionality.

programs specified in the literature (Pharoah et al. 2010, Xia et al. 2011, Mottaghipour and Tabatabaee 2019).

In the studies examined, it can be said that whereas the psychoeducation is mostly practiced for individuals with SMI, the training programs that covers families together with individuals or is applied to families only, are limited. However, in the literature, it is emphasized that psychoeducation programs especially for families are more important because they affect not only families but also individuals with SMI via increasing compliance to the disease, reducing the frequency of relapse and re-hospitalization (Mari and Streiner 1994, Pitschel Walz et al. 2001, Pharoah et al. 2010, Yesufu-Udechuku et al. 2015, Mottaghipour and Tabatabaee 2019). In this respect, it is very important that psychoeducation programs should be carried out as part of the treatment program, involving

with both individuals and their families, as in RUTBE. However, similar to the results of this study, the findings of systematic and meta-analysis studies in the literature are also inadequate in making a discourse on whether the applied programs are incorporated into the clinical practice routine (Mottaghipour and Tabatabaee 2019).

Another remarkable finding of this study is that the strategies for occupational rehabilitation of individuals are not used among the psychosocial interventions for individuals with SMI and their families. In fact, one of the basic principles of psychiatric rehabilitation is occupational rehabilitation of individuals (Liberman 2009, Tirupati 2018). These individuals, who are known to have serious problems regarding the participation in working life, have a high need for occupational rehabilitation (Drakeve et al. 2003). Although, in the recent studies, the individuals have considerably started to work by means of skill training and other methods applied in case management (İncedere and Yıldız 2019), it can be said that the lack of practising psychosocial intervention strategies which can boost the participation of individuals in employment is a notable shortcoming.

One of the biggest problems individuals with SMI and their families experience is stigmatization. In fact, as stated by the World Health Organization (2011), the most exposed to stigmatization in the world are individuals with SMI. When studies dealing with stigmatization on individuals with SMI are examined, it is stated that they experience the most perceived stigmatization (Dickerson et al. 2002, Gerlinger et al. 2013). However, apart from the study of Çuhadar and Çam (2011), it is noteworthy that there is no study employing any psychosocial intervention aimed at reducing the stigma experienced by the individuals and/or their families. On the other hand, the scarcity of psychosocial interventions for stigmatization is emphasized in the literature (Asher et al. 2017). In this respect, there is very little evidence showing the positive effects of psychosocial interventions on the perceived or experienced stigmatization (Asher et al. 2017).

It is known that severe mental illnesses have the most negative effects on individuals' cognitive functionality (Xiang et al. 2010). Except for the study of Yıldız et al. (2018), it is noteworthy that any psychosocial intervention strategy to increase the cognitive functionality of individuals has not not realized.

However, psychosocial interventions for families are also important, because they have the potential to affect not only family members but also individuals with SMI (Mari and Streiner 1994, Pitschel Walz et al. 2001, Pharoah et al. 2010). Thus, the importance and necessity of family interventions were revealed by Brown's (1972) study, which showed that the disease recurred more frequently in individuals with schizophrenia who had families with extreme critical and hostile attitudes. The purpose of psycho-social interventions practiced at the outset was to decrease the recurrence rate of the disease by reducing the negative emotional levels and stress of the families (Pharoah et al. 2010). Further studies showed that families did not know how to deal with their difficulties and that the coping strategies to maintain their family functionality were inadequate (Pitschel Walz et al. 2001, Bademli and Çetinkaya Duman 2011). In this respect, it was understood that families needed significant psycho-social interventions that would enable them to develop effective coping strategies

and reduce care burden and stress (Saunders 2003, Bademli and Çetinkaya Duman 2011, Yesufu-Udechuku et al. 2015). Today, the purpose of family interventions can be listed as follows: (a) developing cooperation with family members providing care, (b) improving the negative family environment (in-family emotional climate) by reducing the stress and care burden they experience, (c) developing the problem solving skills and capacities of family members, (d) reducing the feelings of anger and guilt experienced by families, (e) ensuring that they have reasonable expectations for individuals with SMI, and (f) leading a change in the behavior and belief system of families to achieve desired goals. Within the framework of these purposes, it is aimed to reduce the recurrence of the disease and hospitalizations by increasing the drug compliance of individuals with SMI via the psychosocial interventions to be carried out for families (Pharoah et al. 2010).

It is observed that psychosocial interventions for individuals with SMI and their families are mostly practiced by nurses and psychiatrists. On the other hand, in the various systematic reviews and meta-analysis studies carried out in the field, there is no discussion of which professionals have practiced the intervention. It can be said that the studies mostly focus on the applied interventions and their results (Pitschel Walz et al. 2001, Pharoah et al. 2010, Bademli and Çetinkaya Duman 2011, Acar and Buldukoğlu 2013, Çetinkaya Duman and Bademli 2013, Yesufu-Udechuku et al. 2015, Özkan and Eskiyurt 2016, Mottaghipour and Tabatabaee 2019). The multi-disciplinary team-work approach is very important in the provision of effective mental health services. While the prominent members of this team are psychiatrists, nurses, psychologists, and social workers, it can be said that the team has expanded in line with the development of treatment methods. It can be pointed out that every professional in this team, in which ergotherapists are also important members now, contributes to the provision of mental health services within the framework of their own professional knowledge and ethical principles. Undoubtedly, each intervention includes its own techniques and teaching methods. It is known that employees working in the field of mental health are supported with in-service trainings and there are training standards that the personnel should have based on the units (such as the community mental health center). In this respect, it is thought that psychosocial interventions for both individuals and their families are performed by paying attention to competency. However, it can be said that the findings of this study are inadequate at the point of evaluating the competency of professionals or the effect of their competency on the results of the studies under review.

Conclusion

It has been revealed that the applied programs have a positive effect in areas for individuals with severe mental illness such as social functionality, treatment compliance, quality of life, and in areas for their caregivers such as subjective burden, coping methods, emotional expression and family functionality. In this context, it will be extremely important to extend these programs, and to make them a part of routine clinical practice; despite they currently seem to be implemented in a limited way in Turkey. It is very important to practice the psychosocial interventions to increase the cognitive and professional functionality, which

is among the functionality areas where individuals experience the most problems. It is recommended that every psychosocial intervention intended for individuals with SMI should be carried out in a way that includes their families, and vice versa, and their effectiveness should be evaluated as well. Again, it is considered that there is a need for meta-analysis studies which evaluate the effectiveness of psychosocial interventions in three intervention strategies: psychoeducation, specific skill training, and problem- or symptom-oriented.

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Authors Contributions: The authors attest that she has made an important scientific contribution to the study and has assisted with the drafting or revising of the manuscript.

Peer-review: Externally peer-reviewed.

Conflict of Interest: No conflict of interest was declared by the authors.

Financial Disclosure: The authors declared that this study has received no financial support.