# Schizophrenia



# What is schizophrenia?

Schizophrenia is a serious mental illness that affects how a person thinks, feels, and behaves. People with schizophrenia may appear to have lost touch with reality, which can be distressing for them and their family and friends. The symptoms of schizophrenia can make it difficult to participate in usual, everyday activities, but effective treatments are available. Treatment can help people remain in school, maintain employment, achieve independence, and enjoy personal relationships.

# What are the signs and symptoms of schizophrenia?

It's important to recognize the symptoms of schizophrenia and seek help as early as possible. People with schizophrenia are usually diagnosed between the ages of 16 and 30, after the first episode of psychosis. Starting treatment as soon as possible following the first episode of psychosis is an important step toward recovery. However, research shows that gradual changes in thinking, mood, and social functioning often appear before the first episode of psychosis. Schizophrenia is rare in younger children.

Schizophrenia symptoms can differ from person to person, but they generally fall into three main categories: psychotic, negative, and cognitive.

#### **Psychotic symptoms**

**Psychotic symptoms** include changes in the way a person thinks, acts, and experiences the world. A person experiencing psychotic symptoms often has disrupted thoughts and perceptions, and they may have difficulty recognizing what is real and what is not. For some people, these symptoms come and go. For others, the symptoms become stable over time. Psychotic symptoms include hallucinations, delusions, and thought disorder.

- ► Hallucinations are when a person sees, hears, smells, tastes, or feels things that are not there. Hearing voices is common among people with schizophrenia. People who hear voices may hear them for a long time before family or friends notice a problem.
- ▶ **Delusions** are when a person has strong beliefs that are not objectively true and may seem irrational to others. For example, individuals experiencing delusions may believe that people on the radio and television are sending special messages that require a certain response, or they may believe that they are in danger or that others are trying to hurt them.

► Thought disorder is when a person has ways of thinking that are unusual or illogical. People with thought disorder may have trouble organizing their thoughts and speech. They may stop talking in the middle of a thought, jump from topic to topic, or make up words that have no meaning.

#### **Negative symptoms**

**Negative symptoms** include loss of motivation, loss of interest or enjoyment in daily activities, withdrawal from social life, difficulty showing emotions, and difficulty functioning normally. Negative symptoms include:

- Having trouble planning and sticking with routine activities, such as grocery shopping
- Having trouble anticipating and being motivated by pleasure in everyday life
- ► Talking in a dull voice and showing limited facial expression
- Avoiding social interaction or interacting in socially awkward ways
- ► Having very low energy and spending a lot of time in passive activities. In extreme cases, a person might stop moving or talking for periods of time, which is a rare condition called catatonia.

These negative symptoms are sometimes mistaken for symptoms of depression or other mental illnesses.

#### **Cognitive symptoms**

**Cognitive symptoms** include problems with attention, concentration, and memory. These symptoms can make it hard to follow a conversation, learn new things, or remember appointments. A person's level of cognitive functioning is one of the best predictors of their day-to-day functioning. Health care providers use specific tests to evaluate cognitive functioning. Cognitive symptoms include:

- ► Having trouble processing information to make decisions
- Having trouble using information immediately after learning it
- ► Having trouble focusing or paying attention

#### Risk of violence

Most people with schizophrenia are not violent. Overall, people with schizophrenia are more likely than those without the illness to be harmed by others. For people with schizophrenia, the risk of self-harm and violence to others is most significant when the illness is untreated or co-occurs with alcohol or substance misuse. It is important to help people who are showing symptoms get treatment as quickly as possible.

#### Schizophrenia vs. dissociative identity disorder

Although some of the symptoms may seem similar on the surface, schizophrenia is not dissociative identity disorder (which used to be called multiple personality disorder or split personality). People with dissociative identity disorder have two or more independent identities with distinct behaviors and memories.

### What causes schizophrenia?

Several factors may contribute to a person's risk of developing schizophrenia.

#### Genes

Schizophrenia sometimes runs in families. However, just because one family member has schizophrenia, it does not mean that other members of the family also will have it. Studies suggest that many different genes may increase a person's chances of developing schizophrenia and that no single gene causes the disorder by itself.

#### **Environment**

Research suggests that a combination of genetic factors and aspects of a person's environment and life experiences may play a role in the development of schizophrenia. These environmental factors may include poverty, stressful or dangerous surroundings, and exposure to viruses or nutritional problems before birth.

#### **Brain structure and function**

Research shows that people with schizophrenia may be more likely to have subtle differences in the size of certain brain areas and in connections between brain areas. Some of these brain differences may develop before birth. Researchers are working to better understand how brain structure and function may relate to schizophrenia.

# How is schizophrenia treated?

Current treatments for schizophrenia focus on helping individuals manage their symptoms, improve day-to-day functioning, and achieve personal life goals, such as completing education, pursuing a career, and having fulfilling relationships.

#### **Antipsychotic medication**

Antipsychotic medication can help make psychotic symptoms less intense and less frequent. This type of medication is usually taken every day in a pill or liquid form. Some forms may be given as an injection once or twice a month. To learn more about antipsychotic medication, visit www.nimh.nih.gov/medications.

If a person's symptoms do not improve with usual antipsychotic medication, they may be prescribed clozapine. People who take clozapine must have regular blood tests to check for a potentially dangerous side effect that occurs in 1% to 2% of patients.

People respond to antipsychotic medication in different ways. It is important to report any side effects to a health care provider. Many people taking antipsychotic medication experience side effects such as weight gain, dry mouth, restlessness, and drowsiness when they start taking these medications. Some side effects may go away over time, while others may last.

Do not stop taking a medication without first talking to a health care provider. They can work with you to monitor your health and adjust your treatment plan safely and effectively. Some people may need to try several medications before finding the one that works best.

Read the most up-to-date information on medications, side effects, and warnings on the U.S. Food and Drug Administration (FDA) website at www.fda.gov/drugsatfda.

#### **Psychosocial treatments**

Psychosocial treatments help people find solutions to everyday challenges and manage symptoms while attending school, working, and forming relationships. These treatments are often used together with antipsychotic medication. People who participate in regular psychosocial treatment are less likely to have symptoms reoccur or to be hospitalized.

Examples of this kind of treatment include cognitive behavioral therapy, behavioral skills training, supported employment, and cognitive remediation interventions.

Learn more about psychosocial treatments and therapies at www.nimh.nih.gov/psychotherapies.

#### Family education and support

Educational programs can help family and friends learn about symptoms of schizophrenia, treatment options, and strategies for helping loved ones with the illness. These programs can help friends and family manage their own distress, boost their coping skills, and strengthen their ability to provide support.

#### **Coordinated specialty care**

Coordinated specialty care (CSC) programs are recovery-focused programs for people with first episode psychosis, an early stage of schizophrenia. Health professionals and specialists work together as a team to provide CSC, which includes psychotherapy, medication, case management, employment and education services, and family education and support. The treatment team works collaboratively with the individual to make treatment decisions, involving family members as much as possible.

Compared with typical care, CSC is more effective in reducing symptoms, improving quality of life, and increasing involvement in work or school.

#### **Assertive community treatment**

Assertive community treatment is designed to help individuals with schizophrenia who are likely to experience multiple hospitalizations or homelessness. This type of treatment is usually delivered by a team of health care providers who work together to provide care to patients in the community.

#### Treatment for drug and alcohol misuse

People with schizophrenia may also have problems with drugs and alcohol. A treatment program that includes treatment for both schizophrenia and substance use is important for recovery because substance use can interfere with treatment for schizophrenia.

### How can I find help?

If you have concerns about your mental health, talk to a primary care provider. They can refer you to a qualified mental health professional, such as a psychologist, psychiatrist, or clinical social worker, who can help you figure out the next steps. Find tips for talking with a health care provider about your mental health at www.nimh.nih.gov/talkingtips.

You can learn more about getting help at www.nimh.nih.gov/findhelp. The Substance Abuse and Mental Health Services Administration (SAMHSA) provides information about finding support at https://findsupport.gov and locating mental health services in your area at https://findtreatment.gov.

If you or someone you know is struggling or having thoughts of suicide, call or text the 988 Suicide and Crisis Lifeline at **988** or chat at **988**lifeline.org. In life-threatening situations, call **911**.

# How can I help a friend or relative with schizophrenia?

It can be difficult to know how to help someone who is experiencing psychosis. Here are some things you can do:

- ► Help them get treatment and encourage them to stay in treatment.
- Remember that their beliefs or hallucinations seem very real to them.
- Be respectful, supportive, and kind without tolerating dangerous or inappropriate behavior.
- Look for support groups and family education programs, such as those offered by the National Alliance on Mental Illness at www.nami.org/Support-Education.

#### **Clinical trials**

Clinical trials are research studies that look at ways to prevent, detect, or treat diseases and conditions. These studies help show whether a treatment is safe and effective in people. Some people join clinical trials to help doctors and researchers learn more about a disease and improve health care. Other people, such as those with health conditions, join to try treatments that aren't widely available.

NIMH supports clinical trials across the United States. Talk to a health care provider about clinical trials and whether one is right for you. For more information, visit www.nimh.nih.gov/clinicaltrials.

#### For more information

Learn more by visiting NIMH's website at **www.nimh.nih.gov/health**. For information on a wide variety of health topics, visit the National Library of Medicine's MedlinePlus resource at **https://medlineplus.gov**.

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