Command hallucinations, but is it really psychosis?

Vernon Nathaniel, MD, Jessica Gannon, MD, Ana Lupu, PharmD, Tanu Thakur, MD, and K.N. Roy Chengappa, MD, FRCPC

Due to intense family conflicts, Ms. D, age 26, often is suicidal. She has been hospitalized >25 times, and has received varying diagnoses and medication regimens. How would you help her?

lied by peers. Her family history is significant for schizophrenia (mother), alcohol use disorder (both parents), and bipolar disorder

(sister). Her mother, who is now deceased, was admitted to state psychiatric hospitals for extended periods.

Her medication regimen has changed with nearly every hospitalization but generally has included ≥1 antipsychotic, a mood stabilizer, an antidepressant, and a benzodiazepine (often prescribed on an as-needed basis). Ms. D is obese and has difficulty sleeping, hypothyroidism, gastroesophageal reflux disease (GERD), hypertension, and iron deficiency anemia. She receives medications to manage each of these conditions.

Ms. D's previous psychotic symptoms included auditory command hallucinations. These occurred under stressful circumstances, such as during severe family con-

CASE Frequent hospitalizations

Ms. D, age 26, presents to the emergency department (ED) after drinking a bottle of hand sanitizer in a suicide attempt. She is admitted to an inpatient psychiatric unit, where she spends 50 days, followed by a transfer to a step-down unit, where she spends 26 days. Upon discharge, her diagnosis is schizoaffective disorder-bipolar type.

Shortly before this, Ms. D had intentionally ingested 20 vitamin pills to "make her heart stop" after a conflict at home. After ingesting the pills, Ms. D presented to the ED, where she stated that if she were discharged, she would kill herself by taking "better pills." She was then admitted to an inpatient psychiatric unit, where she spent 60 days before being moved to an extended-care step-down facility, where she resided for 42 days.

HISTORY A challenging past

Ms. D has a history of >25 psychiatric hospitalizations with varying discharge diagnoses, including schizophrenia, schizoaffective disorder, borderline personality disorder (BPD), and borderline intellectual functioning.

Ms. D was raised in a 2-parent home with 3 older half-brothers and 3 sisters. She was sexually assaulted by a cousin when she was 12. Ms. D recalls one event of self-injury/ cutting behavior at age 15 after she was bulDr. Nathaniel is Assistant Professor of Psychiatry, University of Pittsburgh School of Medicine, and Medical Director, Community Treatment Team-Transitional Age, Western Psychiatric Hospital of UPMC, Pittsburgh, Pennsylvania. Dr. Gannon is Assistant Professor of Psychiatry, University of Pittsburgh School of Medicine, Pittsburgh, Pennsylvania. Dr. Lupu is Adjunct Instructor of Pharmacy and Therapeutics, University of Pittsburgh School of Pharmacy, and Clinical Pharmacist, Western Psychiatric Hospital of UPMC, Pittsburgh, Pennsylvania. Dr. Thakur is a PGY-1 Psychiatry Resident, MetroHealth Medical Center, Case Western Reserve University, Cleveland, Ohio. Dr. Chengappa is Professor of Psychiatry, University of Pittsburgh School of Medicine, Pittsburgh, Pennsylvania.

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The authors report no financial relationships with any companies whose products are mentioned in this article, or with manufacturers of competing products.

How would you handle this case?

Answer the challenge questions at MDedge.com/ **psychiatry** and see how your colleagues responded

Table 1

Source: Reference 1

Schizoaffective disorder vs borderline personality disorder

	Schizoaffective disorder- bipolar type	Borderline personality disorder
Key features of psychotic symptoms	Delusions (may be bizarre), hallucinations, disorganized speech, loosening of associations, grossly disorganized and abnormal behavior (eg, agitation, catatonia, mutism, excitement)	Typically, paranoid and self-referential (rarely bizarre), and often mood-congruent
Duration	Typically, persistent psychotic symptoms last days to weeks to months and longer	Mostly brief, lasting minutes to hours to days (ie, "micro-psychotic episodes"). These typically occur in the context of severe affective instability, intense anger, impulsivity, dissociative experiences, and recurrent suicidal or self-mutilation ideations or behaviors
Key features of mood symptoms	Full-fledged and sustained manic and/or depressive episodes occur with psychotic symptoms, but psychotic symptoms "outlast" the affective episodes	Typically, intense affective dysregulation lasts minutes to hours and presents with impulsivity, suicidal or self-injurious behaviors, and/or inappropriate angry outbursts that can result in verbal and physical altercations

Clinical Point

Ms. D reported that the 'voice' she heard was usually her own instructing her to 'take pills'

flicts that often led to her feeling abandoned. She reported that the "voice" she heard was usually her own instructing her to "take pills." There was no prior evidence of bizarre delusions, negative symptoms, or disorganized thoughts or speech.

During episodes of decompensation, Ms. D did not report symptoms of mania, sustained depressed mood, or anxiety, nor were these symptoms observed. Although Ms. D endorsed suicidal ideation with a plan, intent, and means, during several of her previous ED presentations, she told clinicians that her intent was not to end her life but rather to evoke concern in her family members.

After her mother died when Ms. D was 19, she began to have nightmares of wanting to hurt herself and others and began experiencing multiple hospitalizations. In 2010, Ms. D was referred to an assertive community treatment (ACT) program for individuals age 16 to 27 because of her inability to participate in traditional community-based services and her historical need for advanced

services, in order to provide psychiatric care in the least restrictive means possible.

Despite receiving intensive ACT services, and in addition to the numerous inpatient psychiatric hospitalizations, over 7 years, Ms. D accumulated 8 additional general-medical hospitalizations and >50 visits to hospital EDs and urgent care facilities. These hospitalizations typically followed arguments at home, strained family dynamics, and not feeling wanted. Ms. D would ingest large quantities of prescription or over-the-counter medications as a way of coping, which often occurred while she was residing in a step-down facility after hospital discharge.

Considering her current presentation and history, what would be the most appropriate placement for Ms. D?

- a) home with continued ACT services
- b) supportive housing with ACT services
- c) long-term structured residence (LTSR) with full continuum of treatment
- d) supportive housing with an intensive outpatient program (IOP)



The authors' observations

The treatment team decided to transition Ms. D to an LTSR with full continuum of treatment. While some clinicians might be concerned with potential iatrogenic harm of LTSR placement and might instead recommend less restrictive residential support and an IOP. However, in Ms. D's case, her numerous admissions to EDs, urgent care facilities, and medical and psychiatric hospitals, her failed step-down facility placements, and her family conflicts and poor dynamics limited the efficacy of her natural support system and drove the recommendation for an LTSR.

Previously, Ms. D's experience with ACT services had centered on managing acute crises, with brief periods of stabilization that insufficiently engaged her in a consistent and meaningful treatment plan. Ms. D's insurance company agreed to pay for the LTSR after lengthy discussions with the clinical leadership at the ACT program and the LTSR demonstrated that she was a high utilizer of health care services. They concluded that Ms. D's stay at the LTSR would be less expensive than the frequent use of expensive hospital services and care.

EVALUATION A consensus on the diagnosis

During the first few weeks of Ms. D's admission to the LTSR, the treatment team takes a thorough history and reviews her medical records, which they obtained from several past inpatient admissions and therapists who previously treated Ms. D. The team also collects collateral information from Ms. D's family members. Based on this information, interviews, and composite behavioral observations from the first few weeks of Ms. D's time at the LTSR, the psychiatrists and treatment team at the LTSR and ACT program determine that Ms. D meets the criteria for a primary diagnosis of BPD. Previous discharge diagnoses of schizoaffective disorder-bipolar type (*Table 1*,¹ *page 48*), schizophrenia, or bipolar disorder could not be affirmed.

The authors' observations

During Ms. D's LTSR placement, it became clear that her self-harm behaviors and numerous visits to the ED and urgent care facilities involved severe and intense emotional dysregulation and maladaptive behaviors. These behaviors had developed over time in response to acute stressors and past trauma, and not as a result of a sustained mood or psychotic disorder. Before her LTSR placement, Ms. D was unable to use more adaptive coping skills, such as skills building, learning, and coaching. Ms. D typically "thrived" with medical attention in the ED or hospital, and once the stressor dissipated, she was discharged back to the same stressful living environment associated with her maladaptive coping.

Table 2 (page 50) outlines the rationale for long-term residential treatment for Ms. D.

TREATMENT Developing more effective skills

Bolstered by a clearer diagnostic formulation of BPD, Ms. D's initial treatment goals at the LTSR include developing effective skills (eg, mindfulness, interpersonal effectiveness, emotion regulation, and distress tolerance) to cope with family conflicts and other stressors while she is outside the facility on a therapeutic pass. Ms. D's treatment focuses on skills learning and coaching, and behavior chain analyses, which are conducted by her therapist from the ACT program.

Ms. D remains clinically stable throughout her LTSR placement, and benefits from ongoing skills building and learning, coaching, and community integration efforts.

Based on recent evidence, what is the most effective pharmacologic therapy for patients with BPD?

- a) selective serotonin reuptake inhibitors (SSRIs) and second-generation antipsychotics (SGAs)
- b) SGAs and mood stabilizers

Clinical Point

Once a clear diagnosis of BPD is made, Ms. D's goal while at the LTSR is to develop effective skills to cope with family conflict and other stressors

Table 2

Rationale for long-term residential treatment for Ms. D

Facilitates diagnostic clarification through careful chart review; collaboration with current and past treating clinicians; partnering with the patients' primary supports; and interviewing, examining, and continuing to observe the patient in a supportive setting with 24/7 staffing

Allows for careful formulation of a treatment plan and evaluation of the present, extensive psychotropic medication regimen. Presents the possibility of tapering off medications with close observation for emergence of symptom exacerbation and/or psychiatric decompensation

Can accommodate initiation or bolstering of ongoing psychotherapeutic interventions, including skills building and coaching by assertive community treatment (ACT) clinicians who had previously participated in a 2-day training program by a certified dialectical behavior therapy (DBT) trainer. The clinicians could provide support in skills building and learning, conduct behavioral chain analyses, and coach the patient in mindfulness, interpersonal effectiveness, emotion regulation, and distress tolerance

Facilitates graduated community integration efforts with support from community and residential staff and psychiatrists, including strengthened crisis planning and coaching for when the patient goes on home passes and experiences difficult family dynamics and other stressors

Promotes work with family and other natural supports to bolster their efficacy as allies in the patient's recovery, especially during visits and passes into the community

Allows some distance from community stressors so that the patient can identify health goals and pursue wellness strategies, especially given the medical risk factors associated with the unhealthy lifestyles that frequently are comorbid with mental illness and adverse effects of medication

Minimizes the reinforcement of inappropriate coping behaviors, including overdosing/ingesting or presenting to emergency departments to seek admission when not appropriate

- c) omega-3 fatty acids and SSRIs
- d) omega-3 fatty acids and first-generation antipsychotics (FGAs)

The authors' observations

Several systematic reviews²⁻⁵ have found that there is a lack of high-quality evidence for the use of various psychotropic medications for patients with BPD, yet polypharmacy is common. Many patients with BPD receive ≥2 medications and >25% of patients receive ≥4 medications, typically for prolonged periods. Stoffers et al4 suggested that FGAs and antidepressants have marginal effects of for patients with BPD; however, their use cannot be ruled out because they may be helpful for comorbid symptoms that are often observed in patients with BPD. There is better evidence for SGAs, mood stabilizers, and omega-3 fatty acids; however, most effect estimates were based on single studies, and there is minimal data on long-term use of these agents.4

A recent review highlighted 2 trends in medication prescribing for individuals with BPD³:

- a decrease in the use of benzodiazepines and antidepressants
- an increase in or preference for mood stabilizers and SGAs, especially valproate and quetiapine.

In terms of which medications can be used to target specific symptoms, the same researchers also noted from previous studies3:

- The prior use of SSRIs to target affective dysregulation, anxiety, and impulsivebehavior dyscontrol
- mood stabilizers (notably anticonvulsants) and SGAs to target "core symptoms" of BPD, including affective dysregulation, impulsive-behavioral dyscontrol, and cognitive-perceptual distortions
- omega-3 fatty acids for mood stabilization, impulsive-behavior dyscontrol, and possibly to reduce self-harm behaviors.

Clinical Point

Despite a lack of high-quality evidence, mood stabilizers and SGAs are used to treat patients with BPD

Table 3

Ms. D's medications upon admission to LTSR and tapering timeline

Medication	Dosage	Taper and discontinuation duration	Comments	
Olanzapine	20 mg/d	5-mg decrements over 3 months	No recurrence of psychotic or mood symptoms; weight loss of approximately 30 lb	
Haloperidol	150 mg IM every 4 weeks	25-mg IM decrements every 4 weeks until 50 mg IM every 4 weeks, then discontinued	No recurrence of psychotic or mood symptoms	
Benztropine	2 mg/d	Tapered by .5-mg decrements and stopped at 4 months	No recurrence of extrapyramidal symptoms	
Melatonin	9 mg/d	Tapered by 3-mg decrements and stopped at 2 months	After discontinuation, restarted 3 mg at bedtime	
LTSP: long-term structured residence				

TREATMENT Medication adiustments

The treatment team reviews the lack of evidence for the long-term use of psychotropic medications in the treatment of BPD with Ms. D and her relatives, 2-5 and develops a medication regimen that is clinically appropriate for managing the symptoms of BPD, while also being mindful of adverse effects.

When Ms. D was admitted to the LTSR from the hospital, her psychotropic medication regimen included haloperidol, 150 mg IM every month; olanzapine, 20 mg at bedtime; benztropine, 1 mg twice daily; and melatonin, 9 mg at bedtime.

Following discussions with Ms. D and her older sister, the team initiates a taper of olanzapine because of metabolic concerns. Ms. D has gained >40 lb while receiving this medication and had hypertension. Olanzapine was tapered and discontinued over the course of 3 months with no reemergence of sustained mood or psychotic symptoms (*Table 3*). During this period, Ms. D also participates in dietary counselling, follows a portion-controlled regimen, and loses >30 lb. Her wellness plan focuses on nutrition and exercise to improve her overall physical health.

Six months into her stay at the LTSR, Ms. D remains clinically stable and is able to leave the LTSR placement to go on home passes. At

this time, the team begins to taper the haloperidol long-acting injection. One month prior to discharge from the LTSR, haloperidol is discontinued entirely. The treatment team simultaneously tapers and discontinues benztropine. No recurrence of extrapyramidal symptoms is observed by staff or noted by the patient.

A treatment plan is developed to address Ms. D's medical conditions, including hypothyroidism, GERD, and obesity. Ms. D does not appear to have difficulty sleeping at the LTSR, so melatonin is tapered by 3-mg decrements and stopped after 2 months. However, shortly thereafter, she develops insomnia, so a 3-mg dose is re-initiated, and her complaints abate. Her primary care physician discontinues hydrochlorothiazide, an antihypertensive medication.

Ms. D's medication regimen consists of melatonin, 3 mg at bedtime; pantoprazole, 40 mg before breakfast, for GERD; senna, 8.6 mg at bedtime, and polyethylene glycol, 17 gm/d, for constipation; levothyroxine, 125 mcg/d, for hypothyroidism; metoprolol extended-release, 50 mg/d, for hypertension; and ferrous sulfate, 325 mg/d, for iron deficiency anemia.

OUTCOME Improved functioning

After 11 months at the LTSR, Ms. D is discharged home. She continues to receive

Clinical Point

Six months into Ms. D's stay at the LTSR, she is stable on a clinically appropriate medication regimen and can leave the LTSR on home passes

Related Resource

 National Education Alliance for Borderline Personality Disorder. https://www.borderlinepersonalitydisorder.org.

Drug Brand Names

Benztropine • Cogentin Haloperidol · Haldol Hydrochlorothiazide • Microzide, HydroDiuril Hydroxyzine • Vistaril Levothyroxine · Synthroid, Metoprolol ER • Toprol XL Olanzapine · Zyprexa Pantoprazole • Protonix

Polyethylene glycol • MiraLax, Glycolax Quetiapine • Seroquel Senna · Senokot Sertraline • Zoloft Valproate · Depakene, Depakote Ziprasidone • Geodon

Clinical Point

In the 23 months after discharge from the LTSR, Ms. D had markedly fewer ED visits and psychiatric hospitalizations

outpatient services in the community through the ACT program, meeting with her therapist for cognitive-behavioral therapy, skills building and learning, and integration.

Approximately 9 months later, Ms. D is restarted on an SSRI (sertraline, 50 mg/d, which is increased to 100 mg/d 9 months later) to target symptoms of anxiety, which primarily manifest as excessive worrying. Hydroxyzine, 50 mg 3 times daily as needed, is added to this regimen, for breakthrough anxiety symptoms. Hydroxyzine is prescribed instead of a benzodiazepine to avoid potential addiction and abuse.

Oral ziprasidone, 20 mg/d twice daily, is initiated during 2 brief inpatient psychiatric admissions; however, it is successfully tapered within 1 week of discharge, in partnership with the ACT program.

In the 23 months after her discharge, Ms. D has had 1 ED visit and 2 brief inpatient psychiatric hospitalizations, which is markedly fewer encounters than she had in the 2 years before her LTSR placement. She has also lost an additional 30 lb since her LTSR discharge through a healthy diet and exercise.

Ms. D is now considering transitioning to living independently in the community through a residential supported housing program.

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Bottom Line

Psychotic symptoms in patients with borderline personality disorder (BPD) are typically fleeting and mostly occur in the context of intense interpersonal conflicts and real or imagined abandonment. Long-term structured residence placement for patients with BPD can allow for careful formulation of a treatment plan, and help patients gain effective skills to cope with difficult family dynamics and other stressors, with the ultimate goal of gradual community integration.