

CASES THAT TEST YOUR SKILLS

I, Claudius, am paranoid, hypomanic, habitually drunk, and have severe abdominal pains. My family is dysfunctional, and my wife is trying to kill me. What's my problem?

It's not easy being emperor

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Tiberius Claudius Germanicus, age 64 and the third emperor of Rome's Julio-Claudian dynasty, presents to you and reports, "I have severe stomach cramps. I think my wife is poisoning me, but no one believes me. I need your help."

Retrospective diagnoses are difficult and sometimes ill-advised, but pondering the psychiatric diagnoses of historical figures can alert us to possible differential diagnoses in today's patients. Consider this imaginary interview between Claudius and a psychiatrist, which suggests several possible diagnoses.

HISTORY TERRIBLE ROYAL CHILDHOOD

Though born into royalty, Claudius was such a sickly infant that his family was ashamed of him and kept him out of their home. He was raised by servants. As a child, he limped and was ridiculed.

He tells you he received little formal education but had many tutors. He learned several languages and became a distinguished historian, scholar, and

writer. He served in the military, both in Rome and overseas. For 13 years he has ruled the Roman Empire but fears he will soon be overthrown.

Claudius' reign began well. He treated his freedmen advisors well, diligently attended to court proceedings, built an aqueduct, and reorganized the Roman government. Recently, however, he has ruled more eccentrically and harshly. He has ordered capricious and costly public works, such as the futile attempt to drain the 12-mile-long Fucine Lake so that the land could be farmed. He has become fond of gladiatorial games and enjoys ordering the execution of political foes. He drinks several liters of wine daily and gorges himself at imperial banquets.

This patient's family history is complex (*Box, page 75*) and fraught with antisocial behavior and mental illness. Three previous marriages failed, and he describes his current wife, Agrippina, as powerful and manipulative. She has a son, Nero, from an earlier marriage. Claudius fears being poisoned by Agrippina after she instigates a relationship between Nero and Claudius' daughter.

continued

KNOW THE FACTS



13% of patients had diabetes in the landmark CATIE schizophrenia study at baseline—4 times more common than in the general population.¹

Be aware.
Screen and monitor
your patients.
Make a difference.



Reference: 1. Goff DC, Sullivan LM, McEvoy JP, et al. A comparison of ten-year cardiac risk estimates in schizophrenia patients from the CATIE study and matched controls. *Schizophr Res.* 2005;80:45-53.

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INTERVIEW 'SURROUNDED BY ENEMIES'

Claudius is uncooperative during the interview. He is irritable, tends to bark orders, smells of alcohol, stutters severely, and drools. He admits that he is depressed over myriad family problems.

He also believes that he will become a deity when he dies. He reminds you that he has the power to order executions and wonders if he should have Agrippina and her minions killed. He claims to have written 43 books and numerous historical monographs and to be the last person in the world to speak fluent Etruscan, but laments that no one appreciates his scholarly work. He says he is "surrounded by enemies" and rambles on about family intrigue, cabals, and executions.

He is oriented and shows no florid psychotic symptoms or signs of suicidality. His insight and judgment are severely impaired, and he rejects the idea that he might have a psychiatric disorder.

Claudius refuses a physical exam and abruptly terminates the interview after about 20 minutes, saying he must attend to important affairs of state.

FOLLOW-UP CLAUDIUS' 'LAST SUPPER'

You want to get more information from family members but wonder if it is safe to do so. It becomes moot: Claudius dies one evening at dinner, days after the interview.

Claudius suffers from:

- a) lead poisoning
- b) bipolar disorder
- c) alcohol abuse disorder
- d) schizophrenia

The author's observations

Lead poisoning can cause a range of medical and neuropsychological problems, including attention deficits, antisocial behavior, and irritability.¹⁻⁴ Romans—particularly the upper class—were exposed to lead from numerous sources:

- Drinking water was contaminated because lead was used extensively to build ancient Rome's water transportation systems.

- Grape juice fermented to become wine was often preserved in lead vessels, which made it sweeter. The elite drank wine more profusely than did lower-class Romans, who probably could not afford wine. Lead-sweetened grape juice was also used in delicacies eaten by the wealthy.

- The rich also favored expensive, lead-lined bronze bowls and plates, whereas commoners used cheap earthenware. Thus, ancient Rome's ruling class was ingesting lead-contaminated drink and food.

Some scholars, noting the relative sterility of many Roman emperors, have suggested that lead poisoning, which can decrease sperm count and cause miscarriage, may have contributed to the fall of the Roman Empire.⁵

Jerome Nriagu, a geochemist who has studied lead's toxic effects, attributed many of Claudius' symptoms and negative traits to lead poisoning: "He had disturbed speech, weak limbs, an ungainly gait, tremors, fits of excessive and inappropriate laughter, and unseemly anger, and he often slobbered...his contracting of plumbism would not be surprising, since he was an intemperate glutton."⁶ Nriagu also argued that the neuropsychological sequelae of lead poisoning might have clouded the judgment of many Roman emperors.⁶

Yet some scholars, notably Robert Graves,^{7,8} have argued that Claudius was highly intelligent and that his copious writing showcased his scholarly interests, hard work, and sound judgment in young adulthood. Based on Graves' assessment, Claudius probably did not suffer severe plumbism as a child.

Birth injury or cerebral palsy might have caused Claudius' poor gait and drooling, which were present from childhood. As his drinking and gluttony worsened later in life, alcoholism

Box

Family history: Claudius married his niece, adopted his great-nephew

Claudius lived from 10 BC to 54 AD and ruled the Roman Empire from 41 AD until his death during a feast. Some historians believe that Agrippina poisoned him after her son, Nero, married Claudius' daughter, Octavia. Because this marriage ensured Nero's ascendancy to the throne, power-hungry Agrippina no longer needed Claudius.

Claudius was the son of Drusus Claudius Nero and Antonia (the daughter of Mark Antony). His older brother was Germanicus, father of Caligula and Agrippina. Even though Claudius succeeded Caligula as emperor, Claudius was Caligula's uncle.

Nero, in addition to being Claudius' adopted son, was also his great nephew. When Claudius married Agrippina, he was marrying his niece.

and lead poisoning could have shortened Claudius' temper and blurred his judgment, particularly in marrying Agrippina.

Claudius' belief that he would become a god does not strongly indicate psychosis, because his contemporaries believed that emperors could be deified after death. Opler et al,⁹ however, found that prenatal lead exposure, as suggested by elevated D-aminolevulinic acid, may be a risk factor for schizophrenia and other psychiatric disorders that manifest in late adolescence or adulthood.

Although we know little about Claudius' medical problems, abdominal pain has a broad differential diagnosis. Poisoning at Agrippina's hands or alcohol-induced gastritis, as well as lead-induced abdominal colic, could have caused his intolerable pain.

continued

Bipolar disorder. Claudius' unrestrained spending, irritability, impulsivity, grandiosity, and mood lability suggest bipolar disorder. Hypomania could have fueled his vast literary output, which has been lost. His belief that he would be deified could also be a manic symptom.

Hypomania was prevalent among Claudius' family. Two close relatives—his nephew Caligula and great-nephew/adopted son Nero—had marked mood swings. These two emperors were more antisocial than Claudius and showed behavior more consistent with frank mania.

Caligula, who preceded Claudius as emperor, was well known for his excessive behaviors. He was vicious and promiscuous, having sex in public with men, wives of others, and his sisters. Most famously, he considered making his horse, Incitatus, a consul. He gave this horse a “marble stable...a house and a household of slaves and furniture.”¹⁰

Nero, who succeeded Claudius, was an alcoholic who frequently indulged his appetites. He believed he was a great singer and became infamous for playing his fiddle while Rome burned. Some of his last words are supposed to have been, “What an artist dies with me!”¹⁰

Alcoholism. Some historians have estimated that two-thirds of Roman emperors who reigned from 30 BC (Augustus) to 220 AD (Elegabalus) drank heavily.⁶ Claudius was reputedly a heavy drinker, and many features displayed by him and his relatives—bad temper, poor judgment,

paranoia, impulsivity, violence, and sexual indiscretions—can result from alcohol abuse.

Psychosocial stressors. Claudius was raised and surrounded by malevolent people, then given almost limitless power. That mix of circumstances, plus fear fostered by persistent intrigue, may explain some of his behavior, particularly his brutality.

How would you determine Claudius' diagnosis?

- a) serial patient interviews
- b) have patient record symptoms
- c) see how he responds to mood stabilizer
- d) laboratory work

The author's observations

Had laboratories been available in ancient Rome, a blood test would have determined whether Claudius suffered lead poisoning. Diagnosing bipolar disorder and/or alcoholism is much more difficult. Differentiating these disorders from each other and from other psychiatric disorders is challenging, as no laboratory tests confirm the diagnosis. Ongoing clinical observation of the illness and response to medication are crucial.

In some cases, having the patient list his or her depressive and manic episodes on a “life chart” might clarify the diagnosis. This exercise can also help the patient recognize bipolar symptoms and accept that he or she has the illness, which is critical to ensuring treatment adherence. Also start medication at this time.

TREATMENT

Treat bipolar disorder and alcoholism simultaneously, as either disorder could worsen the other's course.^{11,12}

Lithium or valproate would be probable first-line treatments for Claudius. Discuss the medication's risks and benefits with the patient

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How would you handle this case?

Visit www.currentpsychiatry.com to input your answers and compare them with those of other readers

continued from page 76

and involved family members/caretakers. Inform them that you might have to change or add medication if the patient does not respond or experiences side effects.

Psychotherapy and/or psychoeducation are integral to treating comorbid bipolar disorder and alcoholism. Claudius also could have benefited from:

- education about healthy dieting
- counseling against high-risk behaviors associated with alcoholism, such as domestic violence and gambling
- a support group for patients with bipolar disorder or a 12-step program.

WHAT CLAUDIUS CAN TEACH US

Although Claudius' symptoms cannot be diagnosed with certainty, the information and perspective available today offer insight into his likely psychiatric problems. His case reminds us that:

- **Patients often have multiple diagnoses.** Bipolar disorder is strongly associated with substance abuse disorder—particularly alcoholism.
- **Lead-containing alcoholic beverages** are

still a public health concern. Morgan et al¹³ tested 115 samples of moonshine from nine southeastern, south central, and north central U.S. states. One-third of samples contained lead >300 $\mu\text{g}/\text{dL}$. The authors estimated that excessive consumption of 25% of the samples could lead to blood lead levels consistent with lead poisoning ($\geq 25 \mu\text{g}/\text{dL}$).

Lead poisoning is pernicious and still occurs in the United States. Persons who work with lead, live in an old house painted with a lead-based paint, or drink water transported in old pipes with lead solder are at high risk for lead exposure. Children are particularly vulnerable. Some herbal medications also contain lead.¹⁴

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continued

Have a case

from which other psychiatrists can learn?

Check your patient files for a case that teaches valuable lessons on dealing with clinical challenges, including:

- | sorting through differential diagnoses
- | getting patients to communicate clinical needs
- | catching often-missed diagnoses
- | avoiding interactions with other treatments
- | ensuring patient adherence
- | collaborating with other clinicians

Send a brief (limit 50 words) synopsis of your case to pete.kelly@dowdenhealth.com. Our editorial board will respond promptly.

If your synopsis is accepted, we'll ask you to write about the case for a future issue of CURRENT PSYCHIATRY.

KNOW THE FACTS



41% of all patients had the metabolic syndrome at baseline in the landmark CATIE schizophrenia study.¹

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Reference: 1. McEvoy JP, Meyer JM, Goff DC, et al. Prevalence of the metabolic syndrome in patients with schizophrenia: baseline results from the Clinical Antipsychotic Trials of Intervention Effectiveness (CATIE) schizophrenia trial and comparison with national estimates from NHANES III. *Schizophr Res.* 2005;80:19-32.

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Related resources

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DRUG BRAND NAMES

Lithium • Eskalith, others

Valproate • Depakene

DISCLOSURE

Dr. Frankenburg reports no financial relationship with any company whose products are mentioned in this article, or with manufacturers of competing products.

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Patients who, like Claudius, show symptoms of bipolar disorder and alcoholism pose a clinical challenge. Treat both sets of symptoms at once, follow the patient closely, and gauge response to medication.

BottomLine