
**EXPLORING SCHIZOPHRENIA AND LANGUAGE
DISORDER IN THE MAIN CHARACTER OF *A BEAUTIFUL
MIND* (2001) FILM: A PSYCHOLINGUISTIC STUDY**

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ABSTRACT

This research investigates language difficulties brought on by schizophrenia as they are represented in the character John Nash from the 2001 movie *A Beautiful Mind*. Finding signs of a language disorder in the main character's speech patterns, such as paralogia, affective flatness, and disordered speech patterns, is the goal. Selected conversations and scenes from the movie are analyzed as data in this qualitative descriptive study. According to the analysis, schizophrenia severely hinders communication skills by causing problems with speech coherence and emotional expression. This study advances our knowledge of the relationship between language and psychological diseases and emphasizes the significance of truthful media portrayals in lowering stigma toward people with schizophrenia.

Keywords: Schizophrenia, language disorder, psycholinguistics, film, symptoms

ABSTRAK

*Penelitian ini menganalisis gangguan bahasa pada tokoh John Nash dalam film *A Beautiful Mind* (2001) melalui pendekatan psikoleksikologi. Tujuannya adalah mengidentifikasi ciri gangguan seperti pola bicara tidak teratur, paralogia, dan penurunan ekspresi afektif yang tampak dalam dialog. Metode yang digunakan berupa deskriptif kualitatif dengan menganalisis adegan terpilih. Hasilnya menunjukkan bahwa skizofrenia memengaruhi koherensi komunikasi dan ekspresi emosi. Studi ini menegaskan hubungan antara gangguan psikologis dan bahasa, serta pentingnya representasi akurat dalam media untuk mengurangi stigma, sekaligus menjadi rujukan edukasi kesehatan mental.*

Kata kunci: Skizofrenia, gangguan bahasa, psikoleksikologi, film, gejala

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A. INTRODUCTION

Psycholinguistics investigates the ways in which language influences thinking and perception. Beyond serving as a mere means of communication, language functions as a framework for organizing and structuring cognition, profoundly affecting our interpretation of the world. (Humboldt, 1988, p.25) argued that every language possesses a distinctive structure that embodies the perspective of its users, underscoring the profound link between language and cognition. He viewed language as a fluid and ever-changing entity, molded by and in turn molding cultural and societal influences. These concepts from Humboldt formed the basis for subsequent ideas in linguistic relativity, which posit that language not only shapes cognition but also mirrors the cultural environment of its speakers. This perspective connects directly to psycholinguistics through its examination of the interplay between language and thought, a central theme in the field. Humboldt (1988) suggested that language both forms and mirrors the cognitive operations of people, resonating with psycholinguistics' focus on the mind's interaction with language (Humboldt, 1988, p. 25). A further key area involves analyzing language impairments, particularly how psychological or neurological issues can interfere with typical language abilities. Moreover, neurolinguistics, a branch of psycholinguistics, explores the neural mechanisms underlying language processing. In general, a disorder represents an interruption in standard cognitive, emotional, or behavioral operations, impacting multiple facets of daily life. Schizophrenia, for example, leads to cognitive deficits that hinder thinking patterns, thereby impairing language comprehension and expression. People with schizophrenia might exhibit disorganized speech, characterized by sentences that lack coherent progression, as depicted in the portrayal of John Nash in the movie *A Beautiful Mind*.

A Beautiful Mind raises awareness about the intricate nature of schizophrenia, depicting it not merely as a collection of symptoms but as a profound lived reality that permeates every aspect of existence, including interpersonal communication. Examining schizophrenia through the lens of this movie illuminates how the disorder alters individuals' speech and interaction styles. It often results in fragmented language, disjointed thought sequences that are difficult to track, and emotional expressions that seem subdued or detached. By scrutinizing the portrayal of John Nash, viewers can grasp the ways in which the condition influences his verbal expression and conduct, thereby humanizing the experience of schizophrenia. Such examinations also promote more authentic depictions of mental health in cinema and other media, fostering greater public empathy and support for those facing comparable difficulties (Humboldt, 1988, p. 25). *A Beautiful Mind* qualifies as a biographical film, or biopic—a cinematic

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genre that dramatizes the life story of an actual individual, emphasizing pivotal events, accomplishments, and adversities that shape their narrative. These films typically spotlight episodes that expose the subject's personality, hardships, or societal impact, while offering glimpses into their private and public worlds. Released in 2001, *A Beautiful Mind* draws from the real-life experiences of John Nash, a prodigious mathematician grappling with schizophrenia. The narrative delves into Nash's scholarly pursuits, intimate connections, and, above all, his confrontation with mental illness, illustrating the formidable obstacles posed by his symptoms. Nash endures intense hallucinations and delusions, including visions of nonexistent figures and convictions of involvement in clandestine governmental operations. These perceptual distortions impair his capacity to differentiate fact from fiction. Schizophrenia frequently precipitates language impairments, such as disorganized speech, which undermines the logical coherence and organization of expression. Drawing from existing scholarship, this analysis of schizophrenia via John Nash's depiction in *A Beautiful Mind* yields crucial perspectives on how mental disorders influence linguistic and communicative functions. Beyond illuminating the cognitive and affective hurdles encountered by those with schizophrenia, the study emphasizes the value of sensitive and truthful representations in popular media. Through this exploration of linguistic irregularities, it can achieve a richer comprehension of the personal dimensions of schizophrenia, which can mitigate prejudice and inspire more nuanced, caring portrayals of mental health across society (Humboldt, 1988, p. 25). In the realm of psycholinguistics, key characteristics of language disorders become evident when dissecting Nash's dialogue, revealing indicators of delusional reasoning (paralogia) and diminished emotional expressiveness via his flat, toneless speech. These elements underscore the profound ways in which schizophrenia interferes with cognitive processes and verbal output, providing a more comprehensive view of its effects on interaction. This investigation advances psycholinguistic knowledge by enhancing insights into the disorder's influence on linguistic and mental faculties. Specifically, by reviewing the speech patterns of John Nash's character in *A Beautiful Mind*, the work sheds light on distinct psycholinguistic markers of language impairment, including disorganized speech, paralogia, and affective flattening.

This research supports existing theories on the relationship between mental illness and language disruption, expanding the theoretical framework for studying language disorders in schizophrenia (Cartmell & Whelehan, 2007). Practically, this study promotes more accurate and empathetic portrayals of mental illness in media, which can positively impact public awareness and understanding of schizophrenia. By analyzing and highlighting the realistic portrayal of language disorders in Nash's character, the research encourages filmmakers, writers, and

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educators to adopt representations that reduce stigma and foster empathy. This can also aid mental health professionals in using media examples to educate the public on the lived experiences of those with schizophrenia, ultimately supporting a more inclusive and informed society (Bogdan & Biklen, 1976). The study will specifically look at how linguistic impairments linked to schizophrenia are portrayed in the film *A Beautiful Mind*. This entails examining the film's depictions of rambling speech, poor language understanding, and other communication difficulties. The topic of the study will be restricted to certain scenarios and dialogues, which may not encompass the entire range of linguistic abnormalities encountered by individuals diagnosed with schizophrenia. The chosen narrative of the film may result in the omission of certain aspects related to linguistic dysfunction.

Research on schizophrenia and language disorders has largely concentrated on clinical contexts, focusing on symptoms, diagnosis, and treatment (Corcoran et al., 2020; Hitzenko et al., 2022). These works provide essential foundations but often overlook how schizophrenia is represented in cultural products such as film. While some scholarship has examined the portrayal of mental illness in literature and cinema, discussions that specifically address psycholinguistic aspects of these portrayals remain limited (Parrott & Madill, 2022). This research positions itself within that gap by combining psycholinguistic analysis with film studies, using *A Beautiful Mind* (2001) as the main object of inquiry. Instead of viewing schizophrenia solely as a medical condition, the analysis foregrounds how language disruption, such as disorganized thinking, paralogia, hallucinations, and affective flattening, is dramatized through cinematic dialogue. In doing so, the research not only enriches psycholinguistic inquiry but also demonstrates how media representations can shape public awareness and empathy toward individuals with schizophrenia.

B. LITERATURE REVIEW

1. Film in a Literary Work

In a literary work, a film can refer to a narrative medium that adapts a story, theme, or character from literature to the screen, transforming the written text into a visual and auditory experience. This adaptation process often involves altering or condensing parts of the original work, interpreting characters and themes in a new context, and using cinematic techniques like cinematography, editing, and sound to express the emotions and ideas of the original text. Films based on literary works can be direct adaptations or inspired by the original material, and they often bring new insights or perspectives to the source material, while also engaging the audience in a different, visual manner than reading the text itself. Examples include adaptations of novels into movies, such as *The Great Gatsby* or

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Harry Potter, where the essence of the literary work is translated into a visual narrative (Cartmell & Whelehan, 2007).

2. Schizophrenia in Language Disorder

In the context of language, schizophrenia can affect both language production and language comprehension, leading to speech patterns and communication difficulties that reflect the cognitive disruptions caused by the disorder. People with schizophrenia may exhibit disorganized speech, characterized by incoherent or fragmented thoughts, difficulty staying on topic (tangentiality), or providing excessive, unnecessary details (circumstantiality). They may also experience paralogia, where their speech contains illogical or delusional content, often linked to their hallucinations or false beliefs. Additionally, affective flattening can result in a monotone, unemotional delivery of speech, making it difficult for others to understand the emotional context of the conversation. These language impairments reflect the underlying cognitive and psychological challenges that individuals with schizophrenia face, impacting their ability to communicate effectively in daily life. Schizophrenia is characterized by positive symptoms such as hallucinations, delusions, disorganized thinking, and abnormal motor behavior; negative symptoms like emotional flatness, lack of motivation, social withdrawal, anhedonia, and limited speech; and cognitive symptoms including attention deficits, memory impairment, and executive dysfunction, all of which significantly impair an individual's ability to function in daily life. The indicators of schizophrenia include positive symptoms such as hallucinations, delusions, disorganized thinking, and behavior; negative symptoms like emotional flatness, lack of motivation, social withdrawal, and anhedonia; and cognitive symptoms such as impaired attention, memory, and executive function, all of which significantly disrupt daily functioning. Schizophrenia and language disorders both involve communication difficulties and cognitive challenges that impact social interaction, but schizophrenia is a psychiatric disorder with symptoms like hallucinations, delusions, and disorganized thinking, while language disorders primarily affect the production and comprehension of language without psychosis, and their causes, onset, and symptom complexity differ, with schizophrenia involving more extensive cognitive disturbances and language impairments linked to psychosis (Kopelowicz & Liberman, 2003).

3. Positive Symptoms

Positive indications of schizophrenia are characterized by atypical perceptions or conduct that signify an amplification or alteration of typical functionalities. Commonly encompassed within these are auditory or visual disturbances (the perception of stimuli absent from reality), unwavering erroneous

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convictions, incoherent communication, and erratic or atypical physical conduct. The designation of these symptoms as “positive” stems not from their advantageous nature, but from their capacity to introduce exceptional experiences into an individual's psychological condition that are not part of the standard experience (American Psychiatric Association, 2013).

a. Hallucinations are sensory experiences that occur without an external stimulus, meaning the person perceives something that is not actually there. These experiences can affect any of the five senses, but they are most commonly auditory (hearing voices). In individuals with schizophrenia, hallucinations may be linked to the individual's delusions or distorted thoughts. For example, someone might hear voices telling them they are being persecuted or giving them instructions. Hallucinations can be distressing and interfere with daily functioning, as the person may respond to the hallucinated stimuli as though they are real (Muench & Hamer, 2018, pp. 431-438).

b. Delusions are fixed, false beliefs that are not grounded in reality, and despite evidence to the contrary, individuals with delusions remain convinced of their beliefs, which can range from persecutory delusions (believing one is being targeted or harassed) to grandiose delusions (believing one has extraordinary abilities or importance), and can significantly impact their thoughts, behaviors, and social interactions, particularly in conditions like schizophrenia (American Psychiatric Association, 2013).

c. Disorganized Thinking refers to a symptom of schizophrenia where an individual has difficulty organizing their thoughts in a coherent way. This often results in speech that is difficult to follow, as thoughts may jump from topic to topic without logical connections, a phenomenon known as loose associations. People with disorganized thinking might also exhibit tangential speech (going off-topic) or circumstantial speech (providing excessive, irrelevant details). This disorganization can make it challenging for individuals to communicate clearly and engage in meaningful conversations, affecting their daily functioning and interactions with others (American Psychiatric Association, 2013).

d. Abnormal Motor Behavior involves unusual or unpredictable movements and actions, and can manifest in various ways in individuals with schizophrenia. This can include catatonia (lack of movement or response), agitation, excessive movement, or posturing (holding unusual or uncomfortable body positions for extended periods). These behaviors reflect disturbances in the brain's ability to control motor functions and can significantly impact an individual's ability to

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engage in normal physical activities or maintain appropriate social behaviors (American Psychiatric Association, 2013).

4. Negative Symptoms

Negative symptoms are characterized by a decrease or absence of typical emotional and behavioral capabilities. These symptoms encompass affective flattening, which is a diminished range of emotional expression; alogia, indicating a reduction in speech output; avolition, representing a lack of drive or initiative; anhedonia, the impaired capacity for experiencing enjoyment; and social withdrawal, a tendency to disengage from social interactions. In contrast to positive symptoms, which involve the presence of unusual experiences, negative symptoms manifest as a reduction or deficit in standard functions. This often results in considerable difficulties in managing everyday activities (American Psychiatric Association, 2013).

a. Affective Flattening is a negative symptom of schizophrenia characterized by a reduced or absent emotional expression. Individuals with affective flattening show little to no facial expression, such as smiling or frowning, and may speak in a monotone voice. This lack of emotional expression can make it difficult for others to understand how the person feels or respond appropriately in social situations. Affective flattening is not due to a lack of emotion but rather reflects the difficulty in expressing emotions outwardly (American Psychiatric Association, 2013).

b. Lack of Motivation (Avolition) refers to the lack of motivation to initiate and sustain purposeful activities. People with this symptom may struggle to engage in daily tasks such as work, personal hygiene, or household chores. The absence of motivation can affect both simple and complex tasks, making it difficult for individuals to set and achieve goals. Avolition is often linked to the cognitive and emotional disturbances seen in schizophrenia and can result in a significant decline in daily functioning (American Psychiatric Association, 2013).

c. Social Withdrawal is another negative symptom of schizophrenia, where the individual isolates themselves from others and avoids social interactions. This withdrawal can occur due to feelings of paranoia, discomfort in social situations, or a lack of interest in maintaining relationships. Over time, social withdrawal can lead to severe isolation and make it harder for the person to maintain personal or professional connections, further worsening their condition (American Psychiatric Association, 2013).

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d. Anhedonia is the inability to experience pleasure or interest in activities that were once enjoyable, such as hobbies, social interactions, or personal achievements. This symptom is common in schizophrenia and can significantly impact the person's quality of life, as they may lose the drive to participate in things that bring joy or satisfaction. Anhedonia is closely related to emotional disturbances and is a key feature of depressive symptoms within schizophrenia (American Psychiatric Association, 2013).

e. Limited Speech (Alogia) refers to reduced verbal communication, often seen in schizophrenia. This can manifest as poverty of speech, where individuals speak very little, or poverty of content, where speech is overly brief or lacks meaningful detail. In severe cases, individuals with alogia may provide one-word answers or fail to elaborate on their thoughts, making conversations difficult. This symptom reflects the cognitive impairments associated with schizophrenia, particularly in areas related to processing and expressing thoughts (American Psychiatric Association, 2013).

C. RESEARCH METHODS

1. Research Design

This study uses a qualitative descriptive methodology, which focuses on examining and interpreting the language disorder traits of John Nash in *A Beautiful Mind* through detailed, descriptive analysis rather than numerical data or statistical measures. Qualitative research is ideal for understanding complex human behaviors and experiences, as it allows for in-depth exploration of the nuances and contextual factors related to Nash's speech patterns and behaviors, which align with the study's aim to provide a comprehensive, interpretive analysis of language disorder symptoms portrayed in the film (Lambert & Lambert, 2012, pp. 255-256).

2. Data and Data Sources

This section identifies the data and data sources used for the study, which primarily focus on specific scenes and dialogues in the film *A Beautiful Mind* that reflect language impairments characteristic of schizophrenia. The data for this study are in the form of dialogues and monologues that contain language disorders employed by a schizophrenic person, which was directed by Ron Howard and released by Universal Pictures and DreamWorks Pictures, and it lasts for 135 minutes. The data sources are taken from selected dialogues and monologues spoken by John Nash, the film's main character in *A Beautiful Mind*.

3. Research Instruments

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The primary research instrument in qualitative studies is the researcher themselves. This means that the researcher actively engages in data collection, observation, and interpretation, using their skills and experiences to understand and analyze the phenomena in question. In this study, the researcher functions as the main instrument by examining and interpreting language disorder traits in *A Beautiful Mind*. This approach allows for flexible and in-depth exploration, as the researcher adapts to new insights throughout the data collection process. This methodological approach enables a flexible, in-depth exploration of the subject matter, as the researcher can adapt their perspective and techniques as new insights arise throughout the data collection process. By remaining responsive to the data in real-time, the researcher can delve deeper into specific themes or phenomena, capturing a richer understanding of the complex language traits associated with schizophrenia as depicted in the film (Bogdan & Biklen, 1976).

4. Data Collection

The data collection that researchers used to collect the data is watching the film carefully, highlighting, taking notes, completing tasks, and sorting or capturing the data that is relevant to the theory. Then, the researcher makes a data analysis by applying the concepts, which are Psycholinguistics study, Schizophrenia, and Language Disorder (Bogdan & Biklen, 1976).

5. Data Analysis

The data analysis for this study involves a detailed examination of John Nash's speech patterns in *A Beautiful Mind*, focusing on identifying and thematically coding specific language disorder traits such as disorganized speech, hallucinations, delusions, and affective flattening, in order to interpret how these linguistic features reflect the cognitive and psychological impairments associated with schizophrenia; this includes analyzing instances of fragmented or incoherent speech, the impact of Nash's delusions on his communication, and his emotional flattening as observed in his tone and delivery, while comparing these findings to existing psycholinguistic theories on how schizophrenia affects language production and comprehension, ultimately providing insights into the accuracy of the film's portrayal of schizophrenia-related language disorders (Sims, 2018).

D. FINDINGS AND DISCUSSIONS

This section outlines the principal findings of the research and situates them within the established theoretical constructs of psycholinguistics. The data indicate that John Nash, the central figure in the film *A Beautiful Mind* (2001), demonstrates a range of linguistic impairments classifiable as positive symptoms, encompassing hallucinations, delusions, and disorganized discourse, and negative

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symptoms, characterized by reduced verbal output, diminished emotional expression, and social detachment.

1. Disorganized thinking

Disorganized thinking is a core positive symptom of schizophrenia, typically inferred from disorganized speech that reflects disturbances in the logical connection of ideas. The DSM-5 defines it as manifested through derailment, tangentiality, incoherence, or illogical associations between thoughts (American Psychiatric Association, 2013). In clinical terms, patients may shift abruptly from one topic to another with loose associations, provide irrelevant responses, or produce speech that becomes incomprehensible, often described as "word salad." Andreasen (1979, 1986) further identifies features such as illogicality, clanging, and neologisms, emphasizing that these are not stylistic variations but indicators of underlying cognitive dysfunction in information processing. From a psycholinguistic perspective, disorganized thinking reflects a breakdown in the formulation and sequencing of language, disrupting coherent discourse and impairing effective communication. This symptom significantly contributes to functional decline, as it undermines an individual's ability to interact socially, sustain relationships, and perform academic or occupational tasks.

Data 1:

Becky: "Maybe you want to buy me a drink."

Nash appraises her clinically. When he speaks now, his words have a deliberate quality that belies their speed.

Nash: "Look, I don't know exactly what things I am required to say in order for you to have intercourse with me..."

(A Beautiful Mind, 2001, 00:18:30)

In this scene, John Nash is shown trying to approach a woman in a bar. Instead of starting with a casual or socially acceptable introduction, he directly blurts out a question about what words he needs to say in order to convince her to have intercourse with him. The moment feels awkward and out of place because his way of speaking skips the usual flow of small talk or emotional connection that would normally happen in such a context. This reflects his difficulty in navigating social interaction, as he treats communication almost like solving a formula or equation rather than engaging in natural human dialogue. This quotation exemplifies disorganized thinking through its ambiguous language and lack of logical progression. Nash's expression is vague and uncertain, which obstructs clear communication of their intended meaning. Instead of a clear, direct, and relevant statement about the topic, the thought process is fragmented

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and convoluted, preventing effective conversational exchange. Disorganized thinking is characterized by speech that may be tangential, circumstantial, or incoherent, often showing poor connections between ideas or a failure to follow a logical sequence. In this instance, the speaker shows uncertainty about what to say, reflecting cognitive confusion or difficulty organizing thoughts in a coherent way. The phrase "*I don't know exactly what things I am required to say*" signals a disruption in the normal flow of reasoning where the speaker cannot clearly define or recall the expected or appropriate communication, which impairs the ability to convey clear intent (Panov et al., 2023). Nash's statement, "Look, I don't know exactly what things I am required to say in order for you to have intercourse with me..." [00:18:30], demonstrates disorganized thinking. His discourse deviates from standard conversational progression, presenting as disjointed. Instead of cultivating organic social connections, he conceptualizes communication as a problem requiring a solution, indicating a cognitive impairment affecting the coherence and practical application of language (Panov et al., 2023).

2. Delusions

Delusions are classified as one of the core positive symptoms of schizophrenia and other psychotic disorders. In general terms, a delusion is defined as a false belief based on incorrect inference about external reality that is firmly held despite what almost everyone else believes and despite what constitutes incontrovertible and obvious proof or evidence to the contrary (American Psychiatric Association, 2013, p. 87). Unlike ordinary beliefs, which are flexible and open to revision, delusions remain rigid, incorrigible, and resistant to logical counterarguments. Several main characteristics distinguish delusions from other thought abnormalities: (1) Falsity which the belief is demonstrably untrue; (2) Fixedness which means the individual holds the belief with strong conviction regardless of contrary evidence; (3) Non-cultural sanction which means the belief cannot be explained by a cultural or religious framework shared by the community; and the last one (4) Subjective certainty, the individual feels absolutely convinced about the truth of the belief (Sims, 2015). From a clinical perspective, delusions are considered positive symptoms because they represent a distortion or exaggeration of normal cognitive processes, rather than an absence of function (Andreasen, 1984). They play a significant role in the disruption of reality-testing and contribute to functional impairment in social and occupational domains. From a psycholinguistic angle, delusions are often expressed through speech that demonstrates certainty, hostile attribution, or unusual causality.

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Data 6:

Alicia: "John, what's going on? Please, you've got to talk to me—"

Nash: "Go. Now. GET OUT!"

Nash: "There are men outside. They're watching me. They want to stop me."

(A Beautiful Mind, 2001, 01:16:40)

In this moment, a perception of being observed and threatened is expressed. The dialogue conveys a strong conviction that there are men outside who are watching and attempting to interfere. No external evidence is presented within the narrative to support this belief, highlighting its basis in psychological disturbance rather than reality. The statement above can be classified as a delusion because it represents an unfounded, unalterable belief that has no foundation in reality. Despite the lack of objective evidence to support this claim, the person expresses a conviction that men are outside watching and trying to harm or control them. In this case, the speaker's belief that unidentified people are "*watching*" and "*wanting to stop*" them strongly suggests a persecutory delusion. Delusions often involve themes of persecution, control, or threat. This is a prime example of a positive symptom of schizophrenia, in which the individual witnesses hostile intent that is not there. In the audio segment from "There are men outside. They're watching me. They want to stop me." [01:16:40], Nash exhibits delusions, developing a conviction of being under surveillance and facing potential harm, unsupported by verifiable circumstances. Such instances highlight how communication influenced by schizophrenia frequently conveys unfounded confidence, stemming from altered cognitive processes rather than empirical data (Hinzen et al., 2016).

3. Hallucinations

Hallucinations are one of the most prominent positive symptoms of schizophrenia, defined as perception-like experiences that occur without an external stimulus (American Psychiatric Association, 2013, p. 87). Unlike illusions, which are misinterpretations of real external stimuli, hallucinations are entirely generated by the mind yet are experienced with the same vividness, clarity, and sense of reality as true perceptions. The most common form is auditory hallucinations, often consisting of voices that comment on the individual's behavior, engage in dialogue, or issue commands, while other forms include visual, tactile, olfactory, and gustatory hallucinations. According to Andreasen (1984), hallucinations in schizophrenia are closely tied to disturbances in information processing, where internally generated thoughts or sensory images are misattributed as originating from an external source. From a psycholinguistic

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perspective, hallucinations are significant because they frequently appear in patients’ speech, revealing how internally experienced voices or perceptions intrude into discourse and affect language production. Clinically, hallucinations are considered positive symptoms because they represent an addition or distortion of normal perceptual processes, often leading to distress, impaired functioning, and a further disconnection from shared reality.

Data 13:

Nash: "At the hospital. Why couldn't Rosen see you?"

Charles: "Because he's a blind man."

Nash: "You can't see them? They're standing right there! How can you not see them?"

(A Beautiful Mind, 2001, 01:28:10)

The situation unfolds in a public space, where the interaction seems completely real from the character's perspective, but the film provides no evidence of these figures being present. When others fail to respond, the character becomes insistent, pointing toward an empty space and affirming the presence of people standing there. The quotation above can be classified as a hallucination because it reflects a perceptual experience without an external stimulus. In this case, the speaker insists on the presence of people (*"they're standing right there"*) with full conviction and urgency, even though others cannot perceive them. This indicates that the experience is internally generated yet interpreted as real, which is consistent with the DSM-5 definition of hallucinations as perception-like experiences that occur without an external stimulus and that have the full force and impact of normal perceptions (American Psychiatric Association, 2013, p. 87). The phrase ***"How can you not see them?"*** further highlights the discrepancy between the speaker's subjective perception and shared external reality, reinforcing that the experience is hallucinatory rather than grounded in objective evidence. Psycholinguistically, such utterances reveal how hallucinations intrude into discourse, as the speaker treats the false perception as a shared reality, thereby demonstrating a breakdown in reality-testing. This makes the data a clear example of a positive symptom hallucination, as it illustrates an addition or distortion of normal perceptual processes rather than a loss of function. When Nash asserts, "How can you not see them?" [01:28:10], the exchange illustrates hallucinatory experiences, as he observes individuals invisible to others. This utterance highlights the encroachment of non-actual perceptions into interpersonal discourse, thereby destabilizing a common understanding and resulting in unintelligible interactions (Chang et al., 2022).

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Data 30:

Kuhn: “Something like that, yes.”

Nash pauses, stares off. Then ...

Nash: “Would I embarrass you? Yes, I suppose it’s possible. You see, I am crazy. I am dependent on the newer medications. I still see things that are not here. But I choose to ignore them. Like a diet of the mind...”

(A Beautiful Mind, 2001, 02:06:15)

The narrative shows a turning point where the main character begins to recognize that the figures previously perceived are not part of shared reality. Even though those perceptions do not completely disappear, there is an effort to resist engaging with them. This shift marks a moment of awareness in the storyline, as the struggle between internal hallucinations and external reality becomes explicit. The utterance “I still see them sometimes... but I choose not to acknowledge them.” reflects a hallucinatory experience because the speaker explicitly reports perceiving figures (“see them”) in the absence of an external stimulus. This aligns with the DSM-5 definition of hallucinations as perception-like experiences that occur without an external stimulus and that have the full force and impact of normal perceptions (American Psychiatric Association, 2013, p. 87). The phrase “*I still see them sometimes*” indicates persistence of a false sensory perception (visual hallucination), while the following clause “but I choose not to acknowledge them” demonstrates that the speaker recognizes the intrusive nature of the experience and attempts to exercise control over their response to it. It illustrates how hallucinations intrude into discourse by shaping the content of speech even when the speaker attempts to resist or ignore them. Clinically, this utterance exemplifies a positive symptom because it represents an addition or distortion to normal perceptual processes, reinforcing its classification as a hallucination rather than a mere thought or belief. The statement, “I still see them sometimes... but I choose not to acknowledge them,” [02:06:15] suggests that hallucinatory episodes continue to occur even as an individual recovers. In this context, Nash’s recognition and efforts at self-governance illustrate the continuous conflict between distorted perception and deliberate cognitive control, thereby impacting the ability to function effectively in practical language application (Chang et al., 2022).

4. Limited Speech (Alogia)

Limited speech, often referred to as *alogia*, is a negative symptom of schizophrenia characterized by a marked reduction in the amount and content of verbal output. Rather than adding or distorting mental processes like positive symptoms, negative symptoms represent a diminution or loss of normal

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functioning (American Psychiatric Association, 2013). Patients with alogia may provide brief, laconic replies or fail to elaborate spontaneously, resulting in impoverished speech that lacks richness, complexity, and communicative intent. According to Andreasen (1982), this symptom reflects an underlying deficit in thought production rather than a mere unwillingness to speak, indicating cognitive restrictions that interfere with language formulation and expression. From a psycholinguistic perspective, limited speech disrupts coherence and reduces the individual's capacity to engage in effective dialogue, making conversations fragmented and socially strained. Clinically, alogia is significant because it contributes heavily to functional impairment, limiting patients' ability to sustain interpersonal relationships and participate in occupational or academic activities.

Data 16:

Nash: “I can not fail. Do you understand?”

He turns back to the window, his voice breaking with defeat.

Nash: “This is all I am”

John slams his head into the glass again, hard.

Charles: “John, stop—“

Nash: “I can not fail. There's no reason for me then. Do you understand? Do you?!”

(A Beautiful Mind, 2001, 00:44:20)

In this statement, Nash reflects on identity and self-worth after experiencing the heavy impact of schizophrenia on both personal and professional life. Instead of offering a longer explanation of feelings or circumstances, the response is reduced to a single, minimal sentence, leaving little room for elaboration or dialogue. The utterance “This is all I am.” can be classified as an example of limited speech (alogia) because it demonstrates a markedly restricted verbal output and poverty of content. Instead of elaborating or providing detailed information, the speaker produces a brief and minimal response that lacks further explanation or contextual development. According to the DSM-5, alogia is a negative symptom of schizophrenia, characterized by diminished speech productivity and reduced spontaneous elaboration (American Psychiatric Association, 2013). Andreasen (1982) emphasizes that this restriction reflects an underlying deficit in the ability to generate thought, rather than a simple unwillingness to speak. In this utterance, the speaker's expression is notably short and closed-ended, offering no additional information beyond a simple self-referential statement. From a psycholinguistic perspective, such minimal output interrupts discourse coherence and signals a reduced capacity for communication. Therefore, “*This is all I am.*” illustrates limited speech as a negative symptom,

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since it reflects a loss of normal linguistic productivity rather than an addition or distortion of thought.

Within the segment labelled “This is all I am.” [00:44:20], Nash exhibits alogia, a condition distinguished by a reduction in verbal output and minimal detail. The concise and unmodulated nature of this statement signifies a constraint in both the substance of his language and his emotional expression, presenting his communication as reserved and noticeably underdeveloped. Negative symptomatology, including alogia, indicates impairments in language generation and practical communication skills, often leading to significant difficulties in social engagement. Nash’s succinctly phrased remark corresponds with this characterization, as it offers limited semantic content and underscores the attenuated communicative ability often associated with schizophrenia (Raina, S. 2024)

E. CONCLUSION

This study concludes that schizophrenia significantly impacts language use and communication, as shown through John Nash’s character in *A Beautiful Mind* (2001). The analysis identifies both positive symptoms, such as hallucinations, delusions, and disorganized thinking, and negative symptoms, such as affective flattening and limited speech that disrupt coherence, logical flow, and emotional expression in his speech. These findings highlight how schizophrenia manifests in linguistic impairments that go beyond ordinary communication difficulties, reflecting deeper cognitive and psychological disturbances. Furthermore, the film provides a relatively accurate portrayal of these symptoms, offering valuable insight into the relationship between language and mental illness. This research contributes to psycholinguistic studies by showing how schizophrenia alters thought and language, while also emphasizing the importance of accurate media representation in reducing stigma and fostering greater public empathy toward individuals with mental disorders.

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