PSYCHOLOGY CASE RECORD

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By
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CERTIFICATE

This is to certify that this Psychological Case Record is a bonafide record of work done by **Dr. Richa Earnest** during the years 2016-2018. I also certify that this record is an independent work done by the candidate under my supervision.

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CASE RECORD - 1 : Personality Assessment

Name	: Mr. KN
Age	: 19 years
Sex	: Male
Marital status	: Unmarried
Religion	: Hindu
Language	: Malayalam, English
Education	: B.Tech
Occupation	: Student
Socio-economic status	: Upper-middle
Residence	: Urban
Informant	: Mr. KN, his parents

Presenting complaints

- Poor coping in the academic setting
- Excessive somatic preoccupation
- Absenteeism from college
- Inability to control his anger
- Threatening self-harm and cutting behaviour
- Death wishes, crying spells, decreased sleep

Duration: Two years

History of presenting illness

Mr. KN was apparently functioning well till two years ago. He was maintaining well till he finished his tenth grade following which he was shifted to another school which was not of his liking. Since then he began to have problems in coping with academics. He began to refuse to attend school and when coerced to, was found to have absented himself from attending classes which his parents came to know about later. He began to complain of vague somatic symptoms and was found to be preoccupied with them excessively. He started becoming irritable and would lose his temper over trivial issues. He would frequently engage in verbal arguments with his parents. He started threatening self-harm if his wishes were not met and when he could not control his temper. There were many times when deliberately harmed himself by cutting his wrist. All the instances were of low intentionality and lethality. His parents got alarmed by his behaviour and treatment was sought at a local facility. He was admitted and treated with medications and psychotherapy, however not much improvement was made. The above mentioned symptoms continued for the next two years. He somehow finished his schooling and enrolled in a college for pursuing a degree in Engineering. However, a month ago he discontinued the same citing inability to cope as the reason for doing so. Since then worsening was noted in his above mentioned symptoms. His anxiety had worsened. He started having crying spells. He had difficulty in initiating sleep. He remained irritable for most parts of the day. He started having death wishes and the self-injurious behaviour increased.

There was no history suggestive of psychosis, pervasive depressive or manic mood syndrome, generalised anxiety disorder, panic disorder or obsessive compulsive disorder

Treatment history

He was admitted and treated briefly at a local facility with psychotropic medications and psychological intervention without any significant improvement two years ago.

Family history

There was history of substance use disorder in paternal grandfather and father.

Birth &Developmental history

His antenatal period was supervised and uneventful. His delivery was full term normal vaginal with no birth asphyxia or neonatal seizure. His postnatal period was uneventful. His developmental milestones were reported to be normal.

Educational history

He dropped out of B. Tech Engineering course in his first year.

Sexual history

He had male gender identity and heterosexual orientation. He denied any high risk sexual behaviour.

Marital history

He was unmarried

Premorbid personality

Pre-morbidly he was described to be a shy individual. He did not have many friends but had a few close friends. He was perfectionistic in nature. He was short tempered was sensitive to criticism. He was not very religious and had average moral standards.

Medical history

There was past history suggestive of hyperbilirubinemia and sciatica.

Physical examination

His vitals were stable. Healed scars were present over his left forearm. Systemic examinations were within normal limits.

Mental status examination

Mr. KN was a moderately built individual who was well kempt. Eye contact was established and maintained.Rapport could not be easily established during the initial sessions. His attitude towards the examiner was cooperative. His adaptive movements were normal. His speech was spontaneous, coherent and relevant. He was dysphoric and irritable initially. There was no abnormality in the thought process in terms of stream and form. The thought content revealed a lot of somatic preoccupation, distress about perceived academic problems, poor impulse control and suicidal ideations. He denied any perceptual abnormalities. He did not have any obsessive compulsive phenomenon. He was oriented to time, place and person and his memory was intact. His attention could be aroused and sustained. His intelligence was above average. His insight was partial and judgement was impaired.

Provisional diagnoses

- Mixed Personality Disorder
- Adjustment disorder

Aim for psychometric tests

To identify and explore significant personality factors influencing the psychopathology.

Tests administered and rationale for the same

1. **NEO-Five Factor Inventory 3 (NEO FFI 3):**The NEO-FFI is a 60-item test. It provides a quick, reliable and accurate measure of the five domains of personality and is particularly useful when time is limited and when global information on personality is sufficient.

2. **Sack's Sentence Completion Test:** Is is a projective test developed by Dr Sacks and Dr. Levy. It consists of 60 partially completed sentence to which respondent adds the endings. The respondent projects the attitudes towards a personal experience of life. It helps to elicit ideas of self-perception.

3. **Thematic Apperception Test (TAT):** It is a projective measure intended to evaluate a person's patterns of thought, attitudes, observational capacity, and emotional responses to ambiguous test materials. It elicits information about a person's view of the world and his attitudes toward the self and others

Behavioral observation

During the entire period of assessment, she was cooperative. She could comprehend the instructions and paid adequate attention. She appeared well motivated to persist on the task.

Test findings:

NEO FFI 3

On the NEO FFI, he scored high very high on neuroticism, very low on extraversion, low in agreeableness and high on conscientiousness. This indicates that he has a general tendency to experience anxiety, fear, anger and guilt more and is more susceptible to stress. There is a tendency for his emotions to interfere with adaptation resulting in impulsive decisions and poor coping with stress. He tends to be reserved and has a preference to be alone rather than mingle with people although he has the necessary skills to do so when required. He has a tendency to be unconventional in his thinking and likes. He has a tendency to be sceptical of others' ideas and intentions and is more antagonistic in nature. He has a tendency to be fastidious and orderly in nature.

Sentence Completion Test

The Sentence Completion Test indicates conflicts in his relationship with his father and his dislike for his family system, which is more due to his interpersonal issues with his father. He feels that his father dislikes him in general. Mr K tends to consider his father as an enemy as he feels that he is very controlling and lacks an understanding of his needs. Although he values his relationship with his mother, he feels their relationship isn't like before and she may be fed up of him due to his current issues. He considers his family as very conservative and they are judgemental of him.

He is afraid of his own personality. Feels he is a failure and that these fears force him to do things that he dislikes to do so. There is deep regret regarding his adolescence and he appears to consider his life as miserable and regrets being born. He appears to have idealistic goals which may be difficult to accomplish and lead to distress. His self-confidence is poor and he has poor self-concept. His attitude towards self is pessimistic

as he feels that he is a failure and that he cannot succeed in any thing in life. His attitude towards his past is positive while his attitude towards his future is pessimistic. He feels that his future is bleak and that there is no hope for him.

He feels that his friends do not understand him and that they mock him behind his back. He feels that his superiors had placed too much of expectations on him and that his failure to fulfil them has lead them to dislike him. His attitude towards his colleagues shows significant conflicts. He feels that they dislike him, are hostile towards him and therefore he has no friends at work.

His attitude towards women is negative. He considers women to be heartless, envious and materialistic. However, his attitude towards heterosexual relationship shows ambivalence. While he expresses a yearning for the physical aspect of a relationship, he feels that the marriages are pointless as they end in a divorce more often than not.

Thematic Apperception Test

In the TAT, his stories are long, descriptive and well structured. The language and content of the stories do not reveal any formal thought disorder. He identifies with the hero in most of the stories. Most of the stories portray a strong attachment of the hero with the mother. The hero tends to consider his mother as a idealistic individual who is sacrificial and loving. The hero's regard for his mother transcends that of his regard for any other being including God. However, the stories also reveal guilt in the hero for taking advantage of his mother's love and affection. The hero shows hostility towards the father figure in most of the stories and finds fault with him. A deep attachment towards his mother and antagonistic feelings towards his mother indicate an unresolved Oedipus complex. Defence mechanisms of projection and displacement are dominant in most of the stories. The dominant needs seen are a need for affection, nurturance, blame

avoidance and autonomy. Conflicts between autonomy vs dependence and affection vs dominance are observed in the stories. Physical illness, poverty, guilt and moral conflicts are identified as the major presses in the story that appear as barriers to the her from accomplishing his goals and desires in life. However, despite these barriers, the stories show the hero to be persistent and hardworking and the outcome of most of the stories are optimistic.

Conclusion:

The assessment indicated the presence of emotionally unstable, anankastic and narcissistic personality traits suggestive of a mixed personality disorder.

Management

Mr. KN was admitted as an in-patient for the purpose of diagnostic clarification and subsequent rationalization of medications. Clarification of history and serial mental status examinations and the psychological assessments did not reveal any pervasive mood syndrome or any anxiety spectrum disorder. Stress related exacerbation of his personality factors were evident, hence the diagnosis of mixed personality disorder (anankastic, narcissistic, emotionally unstable- impulsive type) was made. His previous medications which included Olanzapine, Venlafaxine, Lamotrigine and Clonazepam were tapered and stopped and he was started on Sertraline. He was encouraged to attend occupational therapy. Activities of daily living were regularised. Patient and parents were allowed to ventilate and their distress was acknowledged. Anger management techniques were taught and the consequences were discussed. He was taught relaxation techniques. Cognitive and behavioural principles and techniques were employed to

identify maladaptive patterns of thinking and behaviour and he was taught to reframe his cognitions and make changes in his behavioural patterns.

CASE RECORD: Intelligence Assessment

Name	: Mrs. GD
Age	: 24 years
Sex	: Female
Marital status	: Married
Religion	: Hindu
Language	: Tamil
Education	: 10th standard
Occupation	: Homemaker
Socio-economic status	: Middle
Residence	: Rural
Informant	: Mrs. GD and her mother
Reliability	: Good

Presenting Complaints

- Slow in learning
- Immature behaviour

- Difficulty remembering things
- Increased use of abusive language
- Wanting to talk to people of opposite gender in her locality

History of Presenting Illness

Since childhood, Ms GD was reported to have been slow in achieving all her milestones. She reportedly started talking only after two years of age and began to walk without support after one and half years of age. She was reported to have difficulty in comprehending concepts and had been repeatedly instructed before she was able to comprehend. She had difficulty in learning new tasks, especially those that involved more complex motor functions. She had difficulty in remembering and performing a list of tasks given to her. She was able to perform simple calculations but had difficulty with complex calculations. She could not count money beyond hundred and was never sent alone to shop to do minor purchases. She could not travel alone by public transport. She was able to do household chores but needed prompts to be able to do them and at times supervision as well. She was unable to make dishes that were a little complex. She was independent in her activities of daily living but at times required prompts to perform them.

Over the last few years, she was reported to be overfamiliar with others and especially with members of the opposite gender. She would hold their hands while talking and smiling more. She also began to spend more time with boys of her age in her neighbourhood and had even written a romantic letter to one boy and insisted that he was in love with her even though he reportedly was not.

She was also reported to be getting irritable for trivial issues and at times, becoming assaultive and using abusive language. There was increased stubbornness and adamant

behaviour and when her wishes were not met immediately, she would become destructive. She would be disrespectful towards the elderly and abuse them verbally.

There was no history of apathy or emotional lability or sexual disinhibition.

There was no history of apraxia.

There was no history suggestive of psychosis or mood syndrome.

There was no history of obsessions or compulsions or phobia or panic attacks.

There was no history of head injury, seizures or any focal neurological deficits.

There was no history of poor eye contact, lack of socialization or repeated movements or behaviours.

Treatment history

She was had not received any medications however had received some training for her low intellect at 8 years of age

Medical History

She did not have any medical co-morbid illnesses

Family History

Her father was an office assistant in a private firm and her mother was a home-maker. She had two younger siblings - a twenty-year-old sister who was pursuing her B. Sc in Nursing and a fifteen-year-old brother who was in his 10^{th} grade of school. There was family history suggestive of a chronic psychotic illness in her paternal grandfather. There was no history of intellectual disability in her family.

Birth and Development History

She was the first of non- consanguineously married parents. Her birth was from a planned pregnancy and the antenatal period was supervised. She was born via full term normal vaginal delivery in a hospital. She had delayed birth cry suggestive of birth asphyxia. There were no other complications such as jaundice, sepsis, hypoglycaemia or seizures. She was adequately immunized for age. There was global delay in her developmental milestones when compared to her siblings. Her mother was unable to quantify the delay in developmental milestones.

Emotional Development and Temperament

She was described to be an extroverted and outgoing child with good social interaction. She enjoyed playing games with children younger than her. There were no features suggestive of attention deficit/hyperactive disorder or oppositional defiant disorder.

School History

Since childhood, Ms. GD's academic performance was below average. She was promoted up to 10^{th} grade despite her poor performance by the school authorities. She passed her 10^{th} grade, however after that she could not continue her studies as she found it difficult. Her academic performance was below average in school. Her medium of instruction was Tamil.

Sexual History

She attained menarche at 16 years of age and was able to maintain menstrual hygiene. Her periods were regular.

Marital history

She was unmarried.

Physical Examination

Her vital signs were stable and her systemic examination was within normal limits.

Mental Status Examination

She was thinly built, and was appropriately kempt. Rapport was established and maintained. She was alert and lucid. There were no abnormal motor movements. She was able to carry out simple as well as complex instructions. She was cooperative towards the examiner. Her posture was erect and relaxed and there were no fluctuations in her motor activity. Her speech was spontaneous, audible with normal reaction time though occasionally irrelevant. Her mood was euthymic with normal range and reactivity. She denied suicidal ideation. There were no abnormalities in the form and stream of thought. She denied delusions, hallucinations and obsessions. She expressed concerns and desire to get married. She was oriented to time, place and person. Her immediate, recent and remotememories were intact. Her attention could be aroused but was difficult to sustain. Her abstract thinking was concrete. Her intelligence was below average. Her social and personal and test judgments was impaired.

Provisional Diagnosis

- Clinically Borderline to mild intellectual disability with behavioural symptoms

Aim of psychological testing

In view of the sub normal level of functioning, it was determined to quantify her intellectual ability.

Tests administered and their rationale

1. The Binet Kamat Test of General Mental Abilities (BKT): The BKT is a test of intelligence that has been standardized for the Indian population and assesses a wide range of intellectual abilities.

2. Vineland Social Maturity Scale (VSMS): The VSMS is a test to help in the assessment of social and adaptive behaviour and competence. The Indian version of the VSMS was developed by Dr. J. Bharat Raj. The VSMS provides a social age and social quotient.

Behavioural observation

She was cooperative for testing and was able to attend to the tasks at hand. She was able to comprehend simple instructions well but had to be repeated often. There was no performance anxiety observed. She was able to communicate appropriately.

Test findings:

Binet Kamat Test

On BKT, the basal age attained was 7 years and her the terminal age was 12 years. Her mental age was found to be 8 years and 6 months and the corresponding IQ was 53, indicating Mild Mental Retardation. Her performance on items assessing social intelligence is much better than on items measuring cognitive functioning.

Vineland Social Maturity Scale

On the VSMS, her social age was 9 years and 3 months and the corresponding SQ was 57, indicative of mild deficits in social and adaptive functioning. The profile of scores in the various domains were as follows

Self-help general	4 years 8 months
Self-help eating	9 years 4 months
Self-help dressing	9 years 4 months
Self-direction	5 years 8 months
Socialization	7 years 8 months
Occupation	8 years 8 months
Communication	8 years 8 months
Locomotion	9 years 4 months

Impression

The assessment was indicative of mild intellectual disability

Management

Her parents were educated about the intellectual disability and the prognosis. They were allowed ventilation and psychological support was provided. They were educated about the need for vocational rehabilitation and the importance of regular structured training of household chores and other skills. Behavioural techniques such as activity scheduling for a structured routine and differential reinforcement for his behavioural problems were also discussed with them. It was explained that there was no active pharmacological intervention available for her.

CASE RECORD: Diagnostic Clarification

Name	: Mrs. JA
Age	: 33 years
Sex	: Female
Marital status	: Married
Religion	: Hindu
Language	: Hindi
Education	: Masters in Commerce
Occupation	: Home-maker
Socio-economic status	: Middle
Residence	: Urban
Informant	: Mrs JA and her mother

Presenting complaints

Repetitive doubts and checking	-since 20 years
Frequent rearranging of objects	- since 20 years
Blasphemous thoughts	- since 20 years
Ritualistic praying	- since 20 years
Repetitive fear of death	- since 2 years

Ritualistic chanting -since 2 years

Decline in day to day functioning -since 2 years

History of presenting illness

Mrs. JA was apparently well till twenty years ago when she began to experience repetitive doubts about whether she has locked the door, switched off electronic appliances and other things. These doubts caused significant distress and anxiety resulting in her having to check repeatedly. Despite her attempts to resist and control her checking, she was unable to do so due to her anxiety. Gradually, she began to have preoccupation with symmetry which resulted in her arranging objects in the house in a specific manner. She also began to experience repetitive blasphemous thoughts of insulting deities which led to ritualistic praying and asking God for forgiveness. Due to the distress and guilt, she began to avoid going to temples. She began to lock herself in the bathroom for hours together and would mutter to herself during that time. Most of the times she would not be amenable to suggestions and would have to be forced out of the bathroom. However, despite these symptoms, she was able to function at home and was able to do most of the chores in her house. Over the last two years, there has been a change in the content of the symptoms to include predominantly, repeated intrusive thoughts and ruminations of fear of death which would cause her to be fearful of all people and situations and would believe that everything and people might harm and cause her to die.She also feared that harm would befall her family as well. She engaged in ritualistic chanting asking God to forgive her and to take care of her. These rituals began to take up to eighteen hours a day and caused her severe distress and dysfunction. Her interest and participation in

household chores and leisure activities gradually decline. She began to require prompts for herself care and became more withdrawn and preoccupied. Her socialization with family members and other declined and she began to verbalize minimally. Her irritability increased and at times, she became assaultive when family members attempted to break her rituals. Her mood remained low mostly and she would tear up for trivial issues. However, she did not express and suicidal ideations or plans.

There was no history suggestive of seizures or head injury

There is no history suggestive of any substance use

There was no history of melancholic symptoms, mania or hypomania.

There was no history of phobia or panic attacks.

Treatment History

She has had a trial of Fluvoxamine up to 200mg/day with good response initially. However, following a period of non-adherence, she failed to respond to the same when re-started. At the time of her index visit to Mental Health Centre in April 2017, she was on Fluvoxamine 200 mg/day, Clomipramine 75 mg/day and Olanzapine 10 mg/daywith minimal response. Therefore, Clomipramine and Fluvoxamine were tapered and stopped and Fluoxetine and Olanzapine was initiated on an outpatient basis.

Family History

She was born of a non- consanguineous union. Her father had a timber business and her mother was a home-maker. She was the fifth of six children. She has two brothers and sisters currently. One elder sister passed away twenty-four hours after her birth. There is family history significant for benzodiazepine dependence syndrome in her father.

Birth and Developmental History

The antenatal period was supervised and uneventful. Her birth was full term normal vaginal delivery with no birth asphyxia or perinatal complications. Her postnatal period was uneventful. Her developmental milestones were normal.

Educational History

She has completed a Master's degree in Commerce. Her academic performance was reported to be average. Her social interaction with her peers and teachers was good. Her hobbies included listening to music, watching movies and cooking.

Occupational History

She was a home- maker and had held no other job positions in the past.

Marital History

She was married to Mr. SA for the past seven years. Her husband is 36 years old and runs a pesticide business. She has a daughter aged three and half years. Her marital life was unsatisfactory secondary to her symptoms.

Sexual History

She hadfemale gender identity and heterosexual orientation. Her partner was her husband. She had regular menstrual cycles. She was not practising coitus interruptus as a method of contraception. She denied any high risk sexual behaviour.

Premorbid Personality

Pre-morbidly she was described to be an introverted individual who was a pessimistic, anxious and sometimes short tempered person. She was a very responsible individual.

Medical History

In February 2016 she was diagnosed to have a benign cervical lesion which was treated with Colposcopy.

Physical Examination

Her vitals were stable and systemic examination was within normal limits

Mental Status Examination

Mrs. JA was a thinly built and adequately kempt individual. She maintained eye contact and rapport could be established gradually. She was guarded during the interview. She maintained an erect but a tense posture while remaining seated during the interview with her hands resting on her lap. She did not have any non- adaptive movements. Her speech was spontaneous and monotonous with good comprehension and increased reaction time. Her mood was dysphoric and her affect was appropriate and congruent with a decreased range and reactivity. She expressed death wishes. There were no suicidal plans or attempts. There were no abnormalities in the form and stream of thought. She expressed distress regarding the repetitive thoughts and had firm belief that they were real and ritualistic chanting might save her and her family. She lacked any control on the thoughts and action and was unable to resist them. She denied perceptual abnormalities. She was oriented to time, place and person. Her immediate, recent and remote memory was intact. Her attention could be aroused and sustained. Her intelligence was average. Her insight was partial and her personal and social judgement was intact.

Provisional Diagnosis

- OBSESSIVE COMPULSIVE DISORDER
- PARANOID SCHIZOPHRENIA CONTINOUS COURSE

Aim for psychometry

- To clarify the diagnosis

Tests administered and Rationale

1. **Rorschach's Ink Blot Test**

   Rationale: The Rorschach Inkblot Test provides an understanding of structure of the personality, affectional needs and ego strength. It also indicates degree of psychopathology.

2. **Yale Brown Obsessive Compulsive Scale**

   Rationale: This scale was designed by Wayne K. Goodman and his colleagues. It is the gold standard measure of obsessive compulsive disorder symptom severity. It is a scale designed to assess the severity and type of symptoms in Obsessive Compulsive disorder. It is a clinician rated, 10 item scale, and measures obsessions and compulsions separately. It can be used to monitor the improvement of symptoms while on treatment.

3. **Sentence Completion Test**

   Rationale: Sacks Sentence Completion Test is a projective test developed by Dr Sacks and Dr Levy. It consists of 60 partially completed sentence to which respondent adds endings. The respondent projects the attitudes towards a personal experience of life. It helps to elicit ideas of self-perception.

Behavioural Observation

She was cooperative in doing the assessment. She was able to comprehend the instructions adequately and communicate appropriately. She was able to sustain her attention over the course of the assessment. At times, she was preoccupied and required prompts to attend to the task at hand.

Test Finding

1. **Rorschach Ink Blot Test**

In the Rorschach, she has given 19 responses indicative of decreased productivity and average mentation. The protocol indicates that she tends to suppress her impulses in favour of conscious values suggestive of inner tension and excessive control. There is a neurotic constriction indicating that although she is capable of responding adequately to the environment, she tends to inhibit such a response due to her need to repress her emotional reactions. She tends to be inhibited in situations that she tends to perceive as threatening and she tends to be disturbed by emotional impact from the environment. High W % with good form level indicates a good organizational capacity. She is ambitious in nature and tends to pursue her ambitions at the expense of other important satisfactions. Predominance of FC responses and lack of CF and C responses indicate the presence of excessive control There is a strong need for control and security. Content analysis reveals variation in content suggestive of good intellectual capacity. High animal percentage indicates a tendency to have adjustment difficulties. Blood responses suggests the presence of anxiety. There are adequate number of popular responses indicating adequate ties with reality.

2. **Yale Brown Obsessive Compulsive Scale**

At admission, her total YBOCS score was 34 indicating severe OCD. She had high scores in all the domains in the YBOCS such as time spent, control over, distress, resistance offered and interference from obsessions and compulsions.

3. **Sentence Completion Test**

The SCT reveals shows that she has a strong attachment with her father but feels that she does not spend enough quality time with him and wishes to do so. She

considers her relationship with her mother as healthy and his satisfied with it. She has a positive attitude towards her family unit. She expresses fear about her illness and worries if her friends would taunt her if they come to know about it. She also feels that her fears force her to do things that she doesn't want to. She also expressed guilt and regret regarding her inability to control the symptoms of her illness. She expresses a strong desire to overcome her illness and feels onlythat would make her happy. She has belief in her ability but feels she is unable to utilize in times of distress due to her illness. She appears optimistic and uncertain about her future suggesting ambivalence in her attitude towards it. She does not express any conflicts in her attitude towards interpersonal relationships. She has high expectations of trust, honesty and integrity in her relationships suggestive of high moral standards. She harbours a conservative attitude towards women and feels that they should not rebel against the wishes of parents and should not be outspoken in their views.

Impression

Assessment revealed the presence of anankastic traits which were suggestive of OCD. There were no signs of psychosis or pervasive mood syndrome. Hence a diagnosis of OCD was made.

Management

Mrs. JA was admitted as an inpatient for diagnostic clarification and further management. Clinical interviews, objective observation and psychological assessment did not reveal the presence of any psychotic or mood symptoms. Hence her diagnosis was kept as Obsessive Compulsive Disorder. Pharmacologically, Fluoxetine was titrated to a dose of 80 mg per day. The Olanzapine was gradually tapered and

stopped. However, in view of partial insight into her illness and the persistence of ritualistic chanting, Risperidone of 0.5 mg was added. Non pharmacologically, she was taught distraction techniques and progressive muscle relaxation exercise to alleviate her anxiety. She was educated about the principles of exposure and response prevention and was initiated; a hierarchy of symptoms was made and she was exposed to them from the least anxiety provoking situation. Cognitive strategies were employed to address her magical thinking. She also underwent Social skills Training in the occupational therapy. She showed partial response and obsessive compulsive symptoms subsided by 50%.

Parents were educated about the nature of her condition, the course and the prognosis. Their queries regarding her condition were clarified. They were taught the principles of differential reinforcement strategies to address her behaviour problems and improve her social skills. The need for long term supervised medications, and follow up was reinforced.

CASE RECORD: Diagnostic Clarification

Name	: Mrs. MA
Age	: 28 years
Sex	: Female
Marital status	: Married
Religion	: Hindu
Language	: Hindi
Education	: Diploma in Animation
Occupation	: Homemaker
Socio-economic status	: Upper Middle
Residence	: Urban
Informant	: Mrs. MA, her husband and mother

Presenting complaints

Persistent Headaches nine years

Memory deficits interfering with work nine years

Inability to sustain job nine years

Increased appetite and weight gain nine years

Low self-esteem nine years

Decreased socialisation	nine years
Not engaging in any productive activity	nine years
Repeated checking and arranging	nine years

History of presenting illness

Mrs. MA was apparently well till 2008 and was functioning independently and performing well in her social and professional domains. In 2008 she started complaining of severe holocranial headaches. Investigationsrevealed neurocysticercosis for which she underwent neurosurgery. Following the operation there was a qualitative change noted in her behavior. She started experiencing memory deficits especially in the domains of immediate and recent memory. She began to have difficulty in recalling content of recent conversations, recent meals and other new information. These began to interfere with her occupational functioning resulting her requiring to quit her job. However, there were no deficits in remote memory and she was able to recall information prior to her surgery with ease. The deficits in recent memory also produced significant conflicts in her personal life with her husband who was not able to understand exactly what was happening. Her family also observed that she had difficulty sustaining conversations and would trail off midway. It caused her significant distress and she became passive and stopped socializing with family and friends alike.She had an increased appetite which caused her significant weight gain. This also contributed to her declining self-confidence and self-esteem. She was also noticed to have repeated checking and arranging behavior. She spent hours arranging and re-arranging her clothes and when the same was

pointed out to her she would become very distressed and irritable. She denied any obsessive character to the thought and action. She did not have any other obsessive compulsive phenomenon. There was no history suggestive of auditory hallucinations or first rank symptoms of schizophrenia. There were no other odd behaviors. She did not have any pervasive mood symptoms, fever, seizures or focal neurological deficits prior to the onset of symptoms. There was no history suggestive of any substance use. There was no history of phobia or panic attacks.

Treatment history

She was evaluated at a local facility by a psychiatrist who started her on Aripiprazole up to 10 mg with no significant improvement. She presented to the mental health centre in June 2017, following which she underwent a thorough neurological work up which did not reveal any organic cause for her current presentation of symptoms.

Family History

She was the second born to non-consanguineously married parents. There is no family history of any neuropsychiatric illness. There were significant problems in relationship between her mother and late father. Her father passed away from complication of cerebrovascular accident following which her mother remarried. Mrs. MA was very attached to her late father and had problems in relationships with her mother.

Birth and Developmental History

The antenatal period was supervised and uneventful. Her birth was full term normal vaginal delivery with no birth asphyxia or perinatal complications. Postnatal period

was uneventful. Both motor and language developmental milestones were reported to be normal.

Educational History

She had completed a diploma in Animation technology.

Occupational History

She had worked in the hospitality industry for a few years prior to her surgery. Currently, she is a home maker.

Sexual History

She hadfemale gender identity and heterosexual orientation. She denied any high risk sexual behaviour. She reported of an inactive sexual life with decreased libido secondary to her interpersonal issues with her husband.

Premorbid Personality

Pre-morbidly she was described to be a confident and an independent woman with high achievements in her social as well as professional life.

Physical Examination

Her vitals were stable and systemic examination was within normal limits

Mental Status Examination

Mrs. MA was plump, well-nourished and appropriately kempt. She maintained eye contact and rapport could be established easily. She was able to follow simple orders. She was cooperative in her manner towards the examiner. She

speech was hesitant with delayed reactivity, decreased productivity and normal prosody. Her mood was dysphoric with normal range and reactivity of affect. She denied suicidal ideations. There were no abnormalities in the form and stream of thought. Her content of thought revealed distress regarding her memory deficits, inability to function secondary to the same and problems in relationship with her husband. She was oriented to time, place and person. Her recent memory was impaired while her immediate and remote memory were intact. Her attention could be aroused but was difficult to sustain as she was distracted easily. Her intelligence was average. She had insight into her illness. Her personal judgement was impaired while her social and test judgement were intact.

Provisional Diagnosis

ORGANIC PERSONALITY CHANGE

PROBLEMS IN RELATIONSHIP WITH SPOUSE

PAST HISTORY OF NEUROCYSTICERCOSIS

Aim for psychometry

- To clarify if the impairment in functioning was secondary to memory deficits or due to personality factors

Tests administered and Rationale

3. **Rorschach Ink Blot Test:** The Rorschach Inkblot Test provides an understanding of structure of the personality, affectional needs and ego strength. It also indicates degree of psychopathology.

4. **Sack's Sentence Completion Test:** Sacks Sentence Completion Test is a projective test developed by Dr Sacks and Dr Levy. It consists of 60 partially completed sentence to which respondent adds endings. The respondent projects the attitudes towards a personal experience of life. It helps to elicit ideas of self-perception.

3. **NEO Five Factor Inventory 3 (NEO FFI 3):** The NEO-FFI is a 60-item test. It provides a quick, reliable and accurate measure of the five domains of personality and is particularly useful when time is limited and when global information on personality is sufficient.

4. **PGI Memory scale:** It was developed by Dr. Dwarka Pershad from PGI Chandigarh. It consists of ten subtests which are used to assess different aspects of memory and employ different methods of recall.

Behavioural observation

She was cooperative in doing the assessments. However, she attempted to complete all the tests in a hurry and often had to be prompted for more responses. She would express distress in doing the tests and would reluctantly finish them with repeated prompts. She was able to understand the instructions given and act accordingly. She was also able to communicate satisfactorily.

Test Findings

Rorschach Inkblot Test

The Rorschach protocol indicates low productivity and average mentation. The protocol indicates a tendency to be impulsive with focus on immediate gratification of needs rather than on long term goals. She tends to act out her impulses and at times, there is a tendency to focus her impulses inward which may manifest as somatic symptoms. Her impulsivity and emotional expression may interfere with her performance and interactions with others. Insensitivity to shading indicates a deprivation in the need to develop and maintain stable, affectional interpersonal relationships. Content analysis shows high animal responses indicates a tendency towards adjustment difficulties. Anatomical responses indicate a preoccupation with the body. Blood and unrealistic human content indicates anxiety. There are adequate number of popular responses indicative of adequate ties with reality.

Sack's Sentence Completion Test

Although she likes her mother, she feels that her mother does not understand her well like before and does not hold her interests in her mind. There is a yearning for her father to return and has difficulty in accepting that it is not possible. She feels that her family does not believe in her ability anymore and that they feel she isn't strong enough to look after herself. There is regret regarding her illness and minor issues in the past. She feels that her goals in life are being thwarted due to her illness and other circumstances out of her control. She believes in her abilities but feels that she may not be able to face issues in life. She has optimistic views about her future and

believes that she will fulfil her desires. There are no conflicts in her attitude towards interpersonal relationships. She holds an attitude that women should be independent, strong and should not feel lower than men. She expresses regret regarding her marriage and that it was something she did not want to be part of.

NEO FFI 3

In the NEO FFI 3, she scores high on neuroticism, average in extraversion, openness and conscientiousness and very low on agreeableness. This suggests that she has a tendency to get upset easily and copes poorly with stress. She is more prone to feelings of guilt, depression and anxiety. She tends to let her emotions often interfere with her functioning and adaptation. She tends to be sceptical of others' intentions, disagreeable and antagonistic towards others. She tends to be straightforward and sincere in her opinions with others which may result in interpersonal issues with others.

PGI Memory Scale

In the PGIMS, her scores were as follows

Subtests	**Raw Score**	**Converted Score**	**Dysfunction Rate**
Remote Memory	6	5+	0
Recent Memory	3	0-2	3
Mental Control	6	0-2	3
Attention & Concentration	8	0-2	3
Delayed Recall	10	5+	0
Immediate Recall	10	5+	0

Subtests	Raw Score	Converted Score	Dysfunction Rate
Similar Pairs	5	5+	0
Dissimilar Pairs	1	0-2	3
Visual Retention	7	0-2	3
Recognition	5	0-2	3

The scores indicate inconsistency in the impairment in various areas of memory. While remote memory, immediate and delayed recall for sentences and recall of similar pairs of word show no impairment, impairment in seen in visual retention, recognition, attention and concentration and recall of dissimilar words. This is suggestive of the deficits being more due to impaired attention and concentration and poor encoding strategies rather than due to memory deficits as such.

Summary of test findings

Assessment indicated that the impairment in functioning observed clinically due to the memory deficits was disproportionate to the findings on the memory assessment. Personality traits contributing to interpersonal issues with others as well as stressors in the form of problems in relationship with husband were identified and could contribute to the difficulties in functioning.

Management

Mrs. MA was admitted as a voluntary patient for diagnostic clarification and further management. History was clarified through clinical interviews with her husband, mother and brother, serial mental status examinations with Mrs. MA, observations in the ward and occupational therapy. None of these revealed any psychotic or pervasive

mood symptoms. Psychological testing indicated that the memory deficits observed clinically were disproportionate to that seen in the assessment. She was taught strategies to overcome her perceived cognitive deficits like setting reminders, reading and revising. She was given an activity schedule which was gradually upgraded. Personality factors were assessed and she expressed a low self-esteem and a chronic feeling of emptiness. She was empowered for the same and cognitive strategies to alter her thoughts were started. She was able to maintain a thought diary and cognitive errors were addressed. Reports of checking and repeated arranging of clothes were not observed in the ward. She was found to have an inability to control her appetite and erratic eating pattern was observed. A diet consultation was made and was advised on a strict diet regime and regular exercise was advised. Mrs. MA's husband was also engaged in the therapy and the problems in the marital dyad were explored. Methods to improve communication between them were taught. Mrs. MA. And her family were allowed to ventilate and supported was extended. Their distress was acknowledged. They were psychoeducated about her condition, course and the prognosis and the need for long term therapy was explained. Pharmacologically the dose of Aripiprazole was decreased to 5 mg as there were no psychotic symptoms and a plan was made to spot it after consulting the local psychiatrist.

CASE RECORD : Neuropsychiatric assessment

Name : Ms. AR

Age : 13 years

Sex : Female

Marital status : Unmarried

Religion : Hindu

Language : Assamese, Hindi

Education : 8th standard

Occupation : Student

Socio-economic status : Middle

Residence : Urban

Informant : Self, Father

Presenting complaints

Diagnosed with Medulloblastoma Vermis in 2012. Underwent surgery on 06/11/012 and received Chemotherapy from 10th December 2012 to 22nd January 2013.

Not able to concentrate - post treatment

Not able to pay attention to the studies - post treatment

Decline in memory	- post treatment
Difficulty in Math and Science	- post treatment
Increased anger and irritability,	- post treatment
Cannot dance due to imbalance	- Since 2012

History of presenting illness

Ms. AR was apparently well till September 2012 when she started experiencing occipital headaches which were severe dull aching kind in character. They were acute in onset and occurring almost everyday. The intensity would decrease on taking pain killers. She experienced nausea and vomiting. There were no aggravating factors.They were not associated with blurring of vision or any difficulty in seeing lights or sounds. They were associated with imbalance in walking. She would sway on both the sides while walking and would also sustain falls, around fifteen per day. She would fall down even while sitting. She also could not look laterally with her eyes on both the sides and she developed double vision. There was no history of loss of consciousness, seizures, giddiness, loss of weight or loss of appetite, loss of power in any limbs, slurred speech, difficulty closing eyes or any swallowing difficulties. She did not have any other co-morbid illnesses. She was thoroughly investigated in the department of Neurosurgery and was found to have Vermian Medulloblastoma, WHO Grade IV. For the same she underwent midline suboccipital craniotomy with excision of C1 posterior arch and subtotal excision of the tumor under general anaesthesia. Following this, she received a course of concomitant radiation therapy of thirty cycles and chemotherapy. Following the treatment she had persistence of some

symptoms like bilateral nystagmus, ptosis, lateral gaze paresis, left upper motor neuron facial paresis and ataxia. She also experienced significant weight loss and fatigue. She developed memory problems. Parents said she was not as attentive as before. She had deficits in immediate and recent memory. Her school performance declined and she started scoring 3-4 on 20 marks tests. She was also unable to write properly owing to the ataxia. Because of the eye problems she couldn't read properly as well. She was referred to Child and Adolescent Psychiatry by Paediatric Oncology department for the purpose of neuropsychological assessment.

There was history of poor emotional regulation post treatment and had difficulty controlling her anger. It was mostly in the family setting.

There was no history of forgetfulness or difficulty in speech.

There was no history suggestive of psychosis or syndromal depression or mania.

There was no history of obsessions or compulsions or phobia or panic attacks.

There was no history of head injury.

There was no history of poor eye contact, lack of socialization or repeated movements or behaviours.

Her biological functions were reportedly normal. She still continued to maintain her basic and instrumental activities of daily living independently.

Treatment history

Midline suboccipital craniotomy with excision of C1 posterior arch and subtotal excision of the tumor under general anaesthesia.

Course of concomitant radiation therapy of thirty cycles and chemotherapy.

Family history

Nil significant family history

Birth and development history

She was born to non-consanguineous union in July 2004. The antenatal period was uneventful. The birth was at full term by normal vaginal delivery. There was no birth asphyxia. Birth weight was 2.4 Kg. She was started on breastfeeding soon after birth. The Gross motor, fine motor and speech milestones were attained age appropriately.

Educational history

She was doing her sixth standard. She was described to be above average in academics prior to the onset of her symptoms. She has many friends and a few close friends. There were no complaints from the school with respect to her academics and peer relations prior to the onset of symptoms. After the treatment she had a significant decline in her academic performance. She was described to be not as attentive as before. She developed difficulty significantly in Mathematics and Science. She experienced deficits in immediate and short term memory. These were also associated with a difficulty reading due to her ptosis and lateral gaze palsy and difficulty writing

due to the ataxia. She was found to irritability and the interpersonal issues were present in the family as well as school env.

Sexual history

She could identify herself as a girl.

Marital history

She was unmarried.

Emotional development and temperament

She was described to be an easy child who was quick to warm up.

Physical examination

Her vitals were stable. There was no pallor or lymphadenopathy. Her cardiovascular system examination, respiratory system examination and gastrointestinal system examinations were normal.

Central nervous system

Cranial nerves – Bilateral Abducens nerve palsy, Left Facial lower motor neuron palsy

Motor system

Bulk - Normal bilaterally

Tone - Normal tone bilaterally

Power - Grade 5 power bilaterally

No involuntary movements

Sensory system

Crude touch, Pain, Temperature - Normal bilaterally

Light touch, Vibration and Joint position sense - Normal bilaterally

Reflexes

Superficial abdominal reflex - Present all four quadrants

Plantar reflex - Flexor bilaterally

Deep tendon reflexes - 3+ bilaterally

Cerebellar functions – Bilateral Nystagmus present. Ataxia present. Couldn't do tandem walk.

Gait – Imbalance and was swaying on both the sides

Meningeal signs - Absent

Skull and spine – A surgical scar present in the midline healed by primary intention.

Mental status examination

She was moderately built and nourished, and was adequately kempt. Eye contact and rapport could be established and maintained. Her attitude towards the examiner was cooperative. There were no abnormal involuntary movements noted. Her primary mental functions were normal. Attention could be aroused and but not sustained. She was oriented to time, place and person. Speech was audible with no deviation. There was no formal thought disorder. There were no depressive cognitions. There were no delusions. There were no obsessions and compulsions. She denied having any

perceptual abnormalities. There were no predominant mood symptoms. Her intelligence was average. Her insight into her condition was good. Her personal, social and test judgments were intact.

Provisional diagnosis

MEDULLOBLASTOMA VERMIS WHO GRADE IV; POST SURGERY, CHEMO AND RADIATION THERAPY

Aims for neuropsychological testing

1. To find out the cognitive profile of Ms AR

2. To relate the findings to clinical presentation

Tests administered

Aims for neuropsychological testing

1. To find out the cognitive profile (in terms of her attention, memory and new learning) of Ms AR

2. To relate the findings to clinical presentation

Tests administered

Neuropsychological Battery- Flexible Battery (items of attention, memory and learning):

Attention and Processing speed

I) Symbol Search

II) Coding

Visuoperceptual and perceptual reasoning

IV) Block Design

V) Matrix Reasoning

VI) Picture Concept

Memory

VII) Digit Span Test

VIII) Letter Number Sequencing

IX) Visuo-spatial Memory- Bender Gestalt test

Verbal comprehension and language

X) Vocabulary

XI) Comprehension

XII) Similarities

Rationale

Attention and Processing speed

Symbol Search-Here the child is asked to decide if target symbol appears in a row of symbols and to mark yes/no accordingly, It evaluates the speed of processing, visuo-motor quickness, concentration and persistence.

Coding-The child is asked to transcribe a digit symbol code as quickly as possible, it evaluates the visuo-motor skills, processing speed and concentration.

Visuoperceptual and perceptual reasoning

Block Design-The child is given blocks and the picture design is shown,

the child is asked to put the blocks together and to construct the design as shown in the picture. It evaluates the visual abstract ability, spatial analysis and abstract visual problem solving.

Matrix Reasoning-The child is presented with a partially filled grid and selects an item that properly completes the matrix, it evaluates the fluid reasoning.

Picture Concept-From each of the rows of two or three of an object, the child was asked to select an object that goes together based on the underlying concept. This measures the fluid reasoning, perceptual organization and categorization.

Memory

Digit Span Test- The child is asked to repeat the dictated series of digits

(forwards and backwards), measures the short term auditory memory and digit backward measures the working memory)

Letter Number Sequencing- The child is presented with a mixed series of number and letter and repeats them with the numbers first and then the letter, it measures the working memory.

Verbal comprehension and language

Vocabulary The child is asked to give oral definitions of a word, it helps us to know the knowledge of the word meanings, language development and fluency.

Comprehension The Child is given oral questions of social and practical understanding, it evaluates a social comprehension and judgment.

Similarities -The child explains how two different things or concepts could be similar, it evaluates the verbal abstract reasoning, verbal categories and concepts and the abstract ability.

Findings

Attention and Processing speed

Her attention and processing speed were in the below average range.

Visuoperceptual and perceptual reasoning

Her visuoperceptual and auditory perceptual reasoning were impaired. Visual construction were impaired

Memory

Her visual memory was impaired. Her auditory memory was in the borderline range.

Verbal comprehension and language

Her verbal comprehension and language were average.

Cerebellar tests

The tandem walk was impaired and she was swaying on both the sides. She was having past pointing for the finger nose finger test on the left side.

Conclusion

On this battery significant scatter is seen with the patient being average with the visuoperceptual and perceptual processing with the processing speed and average on the items with perceptual reasoning and poor on the items associated with working memory and verbal comprehension. Overall the battery shows significant neuropsychological deficits in the areas of attention, memory and processing speed.

Management

Parents were educated about the nature of her condition, the neuropsychological deficits caused due to the tumor and its treatment and the behavioural consequences.

They were told about the Neuropsychological intervention (for attention and, memory) and about improving the functioning of the child both academically and socially. The need for modification of the academic curriculum was suggested and the realistic expectations were explained.

The behavioural changes were discussed and the thought- emotion and behaviour cycle was explained. The distortion of thinking and the need to restructure it was discussed.

Her skills and strengths were identified and discussed and methods to promote them were discussed.