ECRONICON OPEN ACCESS

EC PSYCHOLOGY AND PSYCHIATRY
Review Article

Treatment Approaches in Aggressive Behavior: An Overview

Abin Varghese* and George G

Tutor, Bhopal Nursing College, Bhopal Memorial Hospital and Research Centre, Department of Health Research, Ministry of Health and Family Welfare, Government of India, India

***Corresponding Author**: Abin Varghese, Tutor, Bhopal Nursing College, Bhopal Memorial Hospital and Research Centre, Department of Health Research, Ministry of Health and Family Welfare, Government of India, India.

Received: February 26, 2017; **Published:** March 23, 2017

Abstract

Aggressive behavior is commonly associated with patients having severe mental illness. The aftermath of the aggressive incident by the patient carries negative impact on the caregivers in the inpatient health care facility and in the family which further intensifies the stigma towards mental illness and compromise the care available to the mentally ill patients. It is important to analyze the factors contributing in the origin or escalation of violence in mentally ill patients which in turn helps to prevent and manage aggressive behavior in a therapeutic manner. This article presents an evidenced based approach towards the management of aggressive behavior from patients with severe mental illness in health care facility and in the family environment. Specific techniques are presented for prevention and de-escalation of aggression to prevent violence. The strategies are being outlined in a comprehensive manner in such a way that they can be utilized by health care facility and caregivers to prevent/reduce healthcare violence for a safe and therapeutic environment for everyone.

Keywords: *Aggression; Violence; Mentally Ill Persons; Inpatients; Mental Disorders*

Introduction

Aggressive behavior is a common finding in people with mental illness. This pathological behavior occurs in a variety of psychiatric diseases like bipolar disorder, schizophrenia and dementia. The association between schizophrenia and aggressive behavior is a robust finding [1-5]. Patients with schizophrenia are four times more likely to be convicted of interpersonal violence and ten times more likely to be convicted of homicide than the general population [6].

Aggressive behavior includes verbal threats or abuse, aggression against objects and aggression toward self, others, or property. The prediction of violent or aggressive behavior is very difficult in mentally ill patients as it is complicated by a variety of factors like illicit drug or alcohol abuse [7], unemployment, co-morbid personality disorders, noncompliance with the treatment and previous history of violence [8,9]. Aggressive episodes are prefaced by a series of escalating stages in which patient needs go unmet [6]. At first, patients feel confused and are unable to think clearly or understand what is going on. Next, a phase of disorientation ensues in which there is a heightened sense of incapacitation followed by an urge to flee or fight. If patient's needs remain unmet, loss of control is likely to result. Many investigations frequently provide no information on the identity of the targets of the violence or on the circumstances under which the violence occurs. The present prevailing data on violent behaviour in psychiatric patients is insufficient to assess the exact number of such cases.

The approaches for the management of aggressive behavior is comprehensive and depends upon the severity and the environment in which the patients are exposed to, especially health care settings and the family. The strategies in health care settings can be conceptualized as those aimed for patients at risk for aggression and those who are actively aggressive. The various components for patients at risk includes risk assessment interventions, environment and staff training interventions. The approaches for actively aggressive patients

have historically involved using either seclusion (involuntary placement of a patient in a locked room or area from which the patient is not allowed to leave) or restraints (involuntary administration of mechanical, pharmacologic, or physical interventions, which is seen as more restrictive than seclusion); these practices continue today.

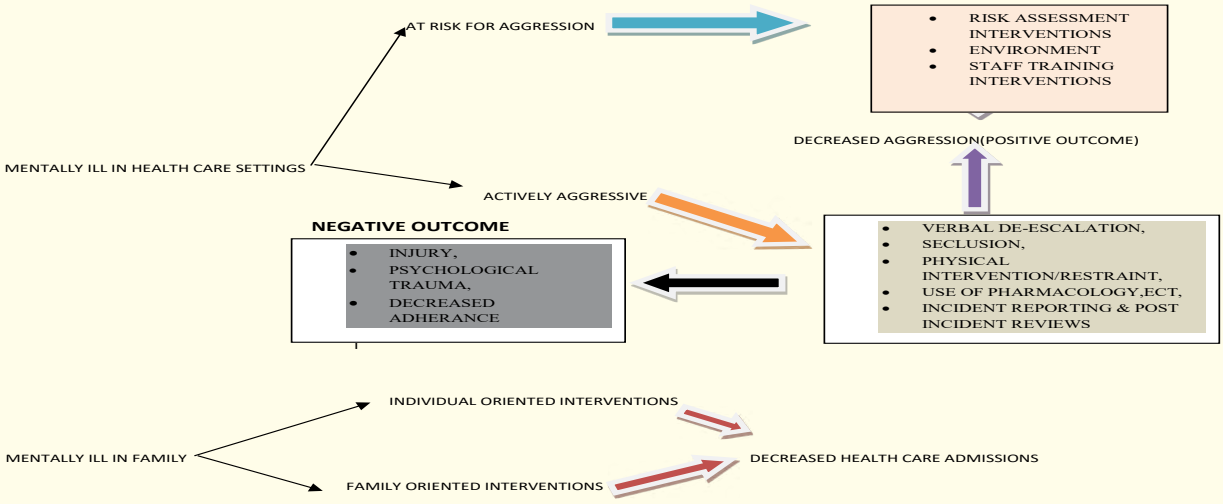

Figure 1: *Conceptual framework for management of aggressive behaviour.*

Risk Assessment Interventions

Risk Assessment interventions are mainly focused as a preventive strategy for reducing the occurence of aggression or violence in mentally ill patients [10]. Structured risk assessment can be used in psychiatric units as part of routine care. The staff may assess the degree of risk, by assessing a number of specific characteristics, behaviours, signs or states which may occur before aggressive or violent events (e.g. confusion, irritability, boisterousness, verbal threats, physical threats and attacking objects, a negative attitude, impulsivity) [11,12]. Long-term risk assessment may be used to predict future violent or aggressive acts once the patient re-enters society after being discharged from hospital, and in making decisions concerning patient care or transfer from high-security wards to units with lower security levels [13].

The mentally patients admitted in health care environment should have standard and uniform screening for risk of violence and aggressive behaviours. With the involvement of the patient and their family, where possible, the risk assessment is the first step in designing a treatment or intervention plan that recognizes the person's unique condition, triggers and care needs which is also mindful of the safety of the person, staff, and others. All of this should be done without labeling the person as being violent or aggressive. The risk assessment process should be based on a combination of quantitative risk assessment and clinical observation of the person's status. Whenever possible, risk screening and assessment should be combined with the overall assessment of the person's needs. Clinical observation, consultation and communication should take place between health care team members as well as others who may be familiar with the person's status or history (e.g., family). Similarly, assessment based on clinical observation can also consider the experience of the care staff in preventing risk, the specific care environment, and the rapid changes that may occur in risk once treatment is implemented.

Documentation is another key principle that frames the risk assessment process. Ongoing documentation of the risk assessment process is essential. Documentation should include: the overall level of risk of harm to others that was identified and the factors contributing to this risk, including the tools used to inform risk assessment, the factors that contribute to risk, prior history of violence or aggressive

behaviours, presence of personal factors that may contribute to risk such as specific symptoms or conditions, and care environment considerations; evidence of an escalation in nature, frequency, and intensity of behaviours; similarity of person's current circumstances to those surrounding previous expressions of violent or aggressive behaviour; and history of violence or aggressive behaviour among family or friends, including the types of behaviours, intended target of behaviours, and consequences.

Communication about risk, including sharing of documentation, is a must within and between care teams. This is especially true during transitions in care where risk of violence or aggression may be heightened because of the instability in observation, introduction of new triggers, or changes to daily structure. Organizations should develop processes to ensure that risk is communicated to the necessary stakeholders [14].

Environmental Interventions

The inpatient environment can have a significant influence on the management of disturbed/violent behavior as it can reduce the risk of violent incidents. All patients and their belongings are searched for hazardous items when entering an inpatient mental health unit. A very careful head to toe body pat search and a metal detector scan is completed by mental health staff in most mental health facilities for prevention of dangerous items entering the unit for safety. Television and music has an effect on the therapeutic milieu. The television programs should be therapeutic in nature and should be monitored for violent programs. Relaxation music is beneficial for reducing anxiety and promoting a calming milieu. The communication between the patient, staff and the caregivers plays a vital role in the prevention of aggression among patients. Always clear open communication should be made with the patients as it can resolve misunderstandings before it becomes a behavioral issue. The health care facility should have a designated area or room specifically for the purpose of reducing arousal; activity rooms and spaces, which encourage consumers to engage in physical exercise, group interaction, therapy and recreation; and patients to have easy access to fresh air and natural day light. The seclusion room should be designated for seclusion only. The room should allow clear observation, be well insulated and ventilated, have access to toilet/washing facilities and be able to withstand damage. The premises near or around the patient should have minimal availability of furniture and other objects that can be used as weapons. The security guards employed in mental health care facility has been linked with potential incidents. It is better recommended to avoid police like uniform for them and they should be trained on defusion and a less aggressive way of responding towards patients. Close Circuit Television (CCTV) and alarm systems are useful only as a part of a package of interventions as they are reactive protective devices utilised during or after an incident. Alert systems can also aid in preventing violent incidents. The panic buttons which can be installed in the high-risk areas helps to call for help. Moreover, the mobile phones can also assist to check on coworkers who are in a potentially dangerous situation and to send coded messages to warn others of staff in difficulty. Staffing levels play a crucial role in violence. Shortage of staff can cause treatment delays, frustration among patients. Staffing levels and staff qualifications in managing violence is particularly important during: patient transfers, emergency responses, meal times, at night, when patients with a history of violence or gang activity are being admitted or treated, and shift periods when aggression is heightened (sundowning) [15-17].

Staff Training Interventions

Staff training in de-escalation techniques is an important feature of aggression management programmes [18]. Benefits for patients and staff are currently unclear, with reported improvements in staff morale and confidence [19], but little impact on the frequency of aggressive incidents [20]. The training should enable staff to develop a person-centered, value based approach to care in which personal relationship, continuity of care and a positive approach to promote health underlie the therapeutic relationship. The staff training on management of aggressive behavior varies depending upon the needs of individual institutions. A basic training programme should address the following factors: understanding theory behind aggression and violence in mentally ill patients, assessing the danger and precautions in the patients, verbal preventive skills teaching, self-defense training; skills, methods and techniques to undertake restrictive interventions safely, discussion of policy/legal issues and post incident briefing.

Verbal de-escalation

The Verbal de-escalation strategies are noncoercive methods which have proved to be more efficient than the coercive methods. There

are broadly three steps in this strategy: first, the patient is verbally engaged; then a collaborative relationship is established; and, finally, the patient is verbally de-escalated out of the agitated state. Natural skill at verbal de-escalation exists on a continuum. However, almost anyone can learn de-escalation techniques and use them successfully if he is well trained and adopts a certain skill set. The most essential skill is a good attitude, starting with positive regard for the patient and the capacity for empathy. Staff should be able to recognize that the patient is doing the best he can under the circumstances, i.e., the patient is experiencing difficulty in conforming to what is expected of him. The ten domains of de-escalation includes the following:1. Respect personal space: When approaching the agitated patient, maintain at least 2 arm's lengths of distance between you and the patient. 2. Do not be provocative-The health care worker must demonstrate by body language that he will not harm the patient, that he wants to listen, and that he wants everyone to be safe. 3. Establish verbal contact -Introduce yourself to the patient and provide orientation and reassurance. A good strategy is to be polite. Tell the patient your title and name. Rapidly diminish the patient's concerns about your role by explaining that you are there to keep him safe and make sure no harm comes to him or anyone else. 4. Be concise- Since agitated patients may be impaired in their ability to process verbal information, use short sentences and a simple vocabulary. 5. Free information can help the examiner identify the patient's wants and needs. This rapid connection based on free information allows the clinician to respond empathically and express a desire to help the patient get what he wants, facilitating rapid de-escalation of agitation. Free information" comes from trivial things the patient says, his body language, or even past encounters one has had with the patient. 6. Listen closely to what the patient is saying-The health care worker must convey through verbal acknowledgment, conversation, and body language that he is really paying attention to the patient and what he is saying and feeling. 7. Agree or agree to disagree: The health care worker shows empathic behavior towards the patient by finding something about the patient's position with which he can agree. 8. Lay down the law and set clear limits: Set limits demonstrating your intent and desire to be of help but not to be abused by the patient. 9. Offer choices and optimism: For the patient who has nothing left but to fight or take flight, offering a choice can be a powerful tool. Be optimistic to the patient by giving realistic time frames for solving a problem and agree to help the patient work on the problem. Let patients know that things are going to improve and that they will be safe and regain control. 10. Debrief the patient and staff: If restraint or force needs to be used, it is important that the staff and the patient be debriefed on the actions after the event [21-25].

Restraints and Seclusion

The term restrains in the context of psychiatry refers to anything that restricts the movement of patient or limits the state of mental awareness. The restrains can be broadly classified into three categories: Environmental, Physical or Mechanical and Chemical measures. The restraints should be used in emergency since all the forms of restraints have a traumatizing influence on the patient. The following are some of the indications for seclusion and restraint: To decrease the stimulation a patient receives, for treatment as part of an ongoing plan of behavior therapy, to prevent serious disruption of the treatment program or significant damage to the physical environment, to prevent imminent harm to the patient or other persons when other means of control are not effective or appropriate, use at the request of a patient.

Environmental

Environmental restraints include the following: placement of the patient in a separate room that is locked (i.e., seclusion) limiting access beyond the patient's room (i.e., locked room) and limiting access beyond the unit (i.e., locked unit). Seclusion is the involuntary confinement of a patient alone in a room or area from which the patient is physically prevented from leaving. They are used when a person is unable to control his or her violent emotions and there is the potential for immediate, harmful behavior to self or to others. These rooms are designed to keep the person safe (i.e. they are free of hazards that the person could use to harm him or herself) and allow for observation by clinical staff. In some instances, where separate seclusion rooms are not available, seclusion can also refer to confinement to the person's room. Seclusion is a temporary measure and should not be used for persons who may be experiencing suicidal ideation or may otherwise be at risk of harm to themselves (e.g., banging head against wall). Seclusion may exacerbate their distress and causes of suicidal ideation. Similarly, it should not be used for persons who have medical conditions that require close monitoring (e.g. someone who has cardiac or respiratory issues and may experience subtle signs of physical distress that might be missed otherwise. The seclusion

room should; allow staff to clearly observe and communicate with the patient, is well insulated and ventilated, with temperature controls outside the room, has access to toilet and washing facilities, has furniture, windows and doors that can withstand damage. Ensure that seclusion lasts for the shortest time possible. Review the need for seclusion at least every two hours and tell the patient that these reviews will take place. Set out an observation schedule for patients in seclusion. Allocate a suitably trained member of staff to carry out the observation, which should be within eyesight as a minimum. Ensure that patient in seclusion keeps their clothing and, if they wish, any personal items, including those of personal, religious or cultural significance, unless doing so compromises their safety or the safety of others. Locked units are generally used to ensure the safety of persons at risk of harm to self or others by preventing them from leaving the unit except with appropriate supervision.

Physical restraint

Physical restraints should be used to minimum and should not be a part of regular treatment programme. This method includes physically /bodily holding the person by staff or security to limit the movement of patient for a brief period of time. The method should be used as a last resort when it is unable to control the behavior of patient irrespective of the verbal de-escalation techniques used. Extreme caution is needed in their application to prevent injury. Physical restraint is undertaken by staff who work closely together as a team, understand each other's roles and have a clearly defined lead. When using manual restraint, avoid taking the patient to the floor, but if this becomes necessary: use the supine (face up) position if possible or if the prone (face down) position is necessary, use it for as short a time as possible. The manual restraint should not be used in such a way that interferes with the patient's ability to communicate, for example by obstructing the eyes, ears or mouth. Do not routinely use manual restraint for more than 10 minutes. Ensure that the level of force applied during manual restraint is justifiable, appropriate, reasonable, proportionate to the situation and applied for the shortest time possible. One team member should explain to the patient what is happening throughout the procedure.

Mechanical restraint

A mechanical restraint is a device or an appliance that restricts or limits freedom of movement. Such devices can include vest restraints, lap belts, pelvic restraints, chairs that prevent rising, wrist restraints, and sheets. The extremities of limbs mechanically restrained must be regularly assesses for signs of restricted blood flow.

Pressure area assessment and care should be taken with those body areas more at risk (sacrum, heels, elbows). Special attention must be paid to provide opportunities for the patient to take food and drink and to void bladder and bowels.

Ending Restraint

The decision for ending the restraint must be done in a planned, controlled manner. Reduction in physical resistance of the patient and content of discussion with the patient by the restraint team leader signals the patient is gaining control. Clear limits should be set regarding expected behavior once the restraint is withdrawn. The holds/mechanical restraint appliances are loosened, then released. Restraint team leader would remain with the individual for a time to provide support and reinforce positive behavior [25].

Chemical restraint

In mental healthcare settings, there are instances where medications may be used to both treat symptoms and manage behaviourial emergencies. Chemical restraint or Acute Control Medication (ACM) refers to the administration of psychotropic medication in situations where a person may have already lost behavioural control or where there is imminent risk of loss of control in behaviour that will lead to harm to self or others. The oral administration of drugs should get priority over the parentral administration of drugs. The broad categories of drugs used are antipsychotics and benzodiazepines. The most commonly used parentral drugs are IV lorazepam and IM haloperidol combined with promethiazine. The advantages of the first generation antipsychotics include good antipsychotic efficacy, sedative effects in higher doses and several decades of experience with their administration. Their limitations are well known adverse events including acute dystonia, extrapyramidal symptoms (EPS), akathisia, hypotension and painful injection with lower potency agents such as chlorpromazine and the risk of malignant neuroleptic syndrome. Benzodiazepines are used in treatment of psychotic agitation

for their sedative and anxiolytic effects as monotherapy or in combination with antipsychotic drugs. They can augment efficacy of the latter and subsequently reduce the dose of an antipsychotic. A recent review of controlled trials reported combination of antipsychotics and benzodiazepines to be superior in improvement rates and a lower incidence of EPS [26]. The second generation antipsychotics are generally effective and safe in the management of agitated behavior [review in: 27]. It should be noted that clozapine, the first agent of this group available for IM administration, is widely recognized as a very effective antiaggressive drug in the treatment of aggression and agitation in psychiatric patients, independent of psychiatric diagnosis [27,28]. However, its use is limited due to the safety concerns regarding the risk of agranulocytosis. The second generation antipsychotics have the following advantages over the first generation antipsychotics; i. m. formulation, rapid dissolving tablets, wafers, and solutions available for some of the atypical, rapid onset of action, rather calming than sedating effects, better tolerability and safety in comparison with typical AP (EPS), more information on pharmacokinetics and dosage regimen, continuing treatment with the same drug during acute and maintenance phases. Other drugs such as olanzepine and Ziprasidone are also being used in the maintenance phase of patients with aggressive behavior. After the administration of medications patient should be monitored for side effects and the patient's pulse, blood pressure, respiratory rate, temperature, level of hydration and level of consciousness at least every hour until there are no further concerns about their physical health status.

Incident Management and review

The quality improvement process at different institutions and units should incorporate incident management and review as a regular part of their policy documents. Each incident of restraint use (mechanical, Physical or chemical) should be reviewed as well as the steps for further control of such incidents should be undertaken. The incident management and review includes a debriefing process, incident reporting, and a formal incident review process (e.g., root cause analysis) in instances where the incident was deemed inappropriate or led to harm of the person or others.

Debriefing

The initial debrief is informal and should take place in the immediate aftermath of an incident and include both the care team and the person involved. The purpose of this debrief is to discuss: what happened; what alternative methods were attempted and failed; and what restraint method was ultimately used.

Incident reporting

The incident happened should be recorded with the date, the time, location and nature of the incident, control interventions used, any details surrounding the nature of the incident (triggers, behaviours or verbalizations that occurred during the incident, etc.), persons involved in the incident (staff, patients, others) and outcomes from the incident (abatement of behavior, injury, etc.). Each institution should develop specific policies for documentation surrounding the use of restraints. The documentation should include the above points about the behavioral emergency as well as specific details about the restraint including the type of restraint used, the staff who ordered and applied the restraint, the type and dosage of medication, the monitoring and review process that was used while the person was in restraint, the total amount of time the person was in the restraint and whether a debriefing was carried out with the person and other team members following the use of restraint.

Formal incident review

Teams are assembled in organizations to conduct reviews of adverse incidents such as behavioural emergencies leading to restraint use. The purpose of the review is to understand the potential factors that led to the use of restraint and to identify triggers that will assist in determining care plan interventions focused on preventing future abusive behaviours toward others [25].

Aggressive behavior at home

Violence by patients with Severe Mental Illness against their family caregivers is a major problem needing intervention. It has many important implications on patient care, caregiver's attitudes and their quality of life. This also adds to the stigma of mental illness. Fami-

lies often do not report physical abuse or verbal abuse by a mentally ill relative and do not seek advice from professionals on the management of difficult behaviour at home [29]. The interventions targeted towards the family should focus on medication compliance, probable warning signs and general management strategies to deal with the aggressive behavior. The medication adherence has an important role in decreasing the aggressive episodes of the patient [8,30]. The caregivers play a significant role in the daily activities of the mentally ill patient; they can be trained to supervise and record the daily intake of medication by the patient which in turn results in good medication adherence [31]. The caregivers training program should include precipitant factors and the warning signs of the patient which includes less sleep [37], more active or pursues more goals (has lots of energy), more sociable, irritable or impatient, agitated or restless, talks much more than usual, speaks very fast, can't concentrate well or is easily distracted, has increased self-confidence, self-importance or optimism and has an elevated mood and drinks lots of alcohol .The precipitant factors mainly includes the unmet demands by the patient in areas like finance and daily activities in the form of not giving money for buying alcohol, refusal to do household chores and so on [8]. The caregivers can adopt a variety of strategies at home to prevent or mitigate the outcome of an aggressive incident. The practical things such as arranging more quiet evenings at home together if the person is becoming aggressive thereby reducing sensory stimuli for the patient. The patient may also benefit from practical assistance if a stressful event occurs. When a stressful event occurs offer to listen if the person needs to talk or discuss solutions to a problem the person is finding stressful, without solving the problem for them. The use of verbal skills i.e. talking with love, affection, gentleness and lesser provocative methods of communication, careful listening to the patient and diverting away from situation are satisfying methods to manage aggressive behaviour from the patient.

The individual oriented interventions which helps to reduce triggers includes encouraging the patient at each follow to have regular sleep patterns, a basic routine for everyday life, regular exercise (provided this is not done close to bedtime as this can interfere with sleep). Besides enhancing physical health, regular exercise has a positive effect on anxiety, depression, sleep problems and self-esteem [35,36], taking ongoing medication prescribed ,regulating the stimulation they receive (e.g. support the person's decision to have quiet times between social engagements or restore sleep habits after celebrations), avoid unrealistic or excessively demanding goals, stopping or reducing the use of substances that make moods worse (e.g. caffeine, alcohol or street drugs). A healthy diet, finding ways to relax and unwind and adopting a problem solving approach [32-34,37-39].

Discussion

Aggressive behavior exhibited by mentally ill patients in health care facility and family is preventable with early assessment and intervention strategies. Each health care facility should have a violence prevention plan ensuring the safety of patient and staff. The plan should be holistic in nature addressing the management strategies for patients at risk for aggression and those who are actively aggressive. Implementation of such a plan will aid in the wellness and recovery of patient. The restraints should be the last resort of intervention to be used as it has the potential of causing psychological and physical trauma to the patient. Verbal de-escalation techniques should be used at its maximum so that the uses of restraints are minimized. The management of patients at home requires a collaborative effort from the patient and caregiver specially emphasizing on medication compliance, unmet demands of the patient and the ability to tackle the precipitants and warning signs of aggressive behavior.

Bibliography

1. Arseneault L., *et al*. "Mental disorders and violence in a total birth cohort: results from the Dunedin study". *Archives of General Psychiatry* 57.10 (2000): 979-986.

2. Swanson JW., *et al*. "Violence and psychiatric disorder in the community: evidence from the Epidemiologic Catchment Area surveys". *Hospital Community Psychiatry* 41.7 (1990): 761-770.

3. Brennan PA., *et al*. "Major mental disorders and criminal violence in a Danish birth cohort". *Archives of General Psychiatry* 57.5 (2000): 494-500.

4. Volavka J., *et al*. "History of violent behavior and schizophrenia in different cultures. Analyses based on the WHO study on Determinants of Outcome of Severe Mental Disorders". *British Journal of Psychiatry* 171 (1997): 9-14.

5. Wallace C., *et al*. "Serious criminal offending and mental disorder. Case linkage study". *British Journal of Psychiatry* 172 (1998): 477-484.

6. Carlsson G., *et al*. "Patients longing for authentic personal care: a phenomenological study of violent encounters in psychiatric settings". *Issues in Mental Health Nursing* 27.3 (2006): 287-305.

7. Volavka J., *et al*. "Efficacy of aripiprazole against hostility in schizophrenia and schizoaffective disorder: data from 5 double-blind studies". *Journal of Clinical Psychiatry* 66.11 (2005): 1362-1366.

8. Varghese A., *et al*. "Pattern and Type of Aggressive Behavior in Patients with Severe Mental Illness as Perceived by the Caregivers and the Coping Strategies Used by Them in a Tertiary Care Hospital". *Archives of Psychiatric Nursing* 30.1 (2016): 62-69.

9. Milton J., *et al*. "Aggressive incidents in first-episode psychosis". *British Journal of Psychiatry* 178 (2001): 433-440.

10. Abderhalden C., *et al*. "Structured risk assessment and violence in acute psychiatric wards: randomised controlled trial". *British Journal of Psychiatry* 193.1 (2008): 44-50.

11. Almvik R., *et al*. "Assessing risk for imminent violence in the elderly: the Brøset Violence Checklist". *International Journal of Geriatric Psychiatry* 22.9 (2007): 862-867.

12. Ogloff JR and Daffern M. "The dynamic appraisal of situational aggression: an instrument to assess risk for imminent aggression in psychiatric inpatients". Behavioral Sciences and the Law 24.6 (2006): 799-813.

13. Dolan M and Blattner R. "The utility of the Historical Clinical Risk -20 Scale as a predictor of outcomes in decisions to transfer patients from high to lower levels of security - A UK perspective". *BMC Psychiatry* 10 (2010): 76.

14. Emanuel LL., *et al*. "The Patient Safety Education Program - Canada (PSEP - Canada) Curriculum" (2013).

15. Rice M., *et al*. "Violence in Institutions, Prediction and Control". *Hogrete and Huber Publishers* (1989).

16. Mcknight S. "The Nature of Violence: Origins and Prevention of Healthcare Violence". *Journal of Nursing Care* 3 (2014): 183.

17. Richards R. "Management of workplace violence victims". An ILO/ICN/WHO/PSI Joint Programme Working Paper Geneva (2003).

18. Farrell G and Cubit K. "Nurses under threat: A comparison of content of 28 aggression management programs". *International Journal of Mental Health Nursing* 14.1 (2005): 44-53.

19. Gournay K. "The Recognition, Prevention and Therapeutic Management of Violence in Mental Health Care: A Consultation Document". London: Department of Health Services Research, Institute of Psychiatry and South London and Maudsley NHS Trust (2001).

20. Bowers L., *et al*. "Prevention and management of aggression training and violent incidents on UK acute psychiatric wards". *Psychiatric Services* 57.7 (2006): 1022-1026.

21. Rice M E., *et al*. "Violence in Institutions: Understanding, Prevention, and Control". *Ontario: Hans Huber Publishers* (1989).

22. Richmond JS., *et al*. "Verbal De-escalation of the Agitated Patient: Consensus Statement of the American Association for Emergency Psychiatry Project BETA De-escalation workgroup". *Western Journal of Emergency Medicine* 13.1 (2012): 17-25.

23. Smith MJ. "When I Say No, I Feel Guilty: How to Cope - Using the Skills of Systematic Assertive Therapy". *New York: Dial Press* (1975).

24. Fishkind A. "Calming agitation with words, not drugs: 10 commandments for safety". *Current Psychiatry* 1.4 (2002): 32-39.

25. National Institute for Clinical Excellence. "Violence: The short-term management of disturbed/violent behavior on psychiatric in-patient setting and emergency departments: Nice guideline" (2005).

26. Yildiz A., *et al*. "Pharmacological management of agitation in emergency settings". *Emergency Medicine Journal* 20.4 (2003): 339-346.

27. Ratey JJ., *et al*. "The effects of clozapine on severely aggressive psychiatric inpatients in a state hospital". *Journal of Clinical Psychiatry* 54.6 (1993): 219-223.

28. Brieden T., *et al*. "Psychopharmacological treatment of aggression in schizophrenic patients". *Pharmacopsychiatry* 35.3 (2002): 83-89.

29. Creer C and Wing JK. "Schizhophrenia at home". Surbiton, National Schizhophrenia Fellowship (1974).

30. Ascher-Svanum H., *et al*. "Medication adherence and long term functional outcomes in the treatment of schizophrenia in usual care". *Journal of Clinical Psychiatry* 67.3 (2006): 453-460.

31. Farooq S., *et al*. "Schizophrenia medication adherence in a resource-poor setting: randomised controlled trial of supervised treatment in out-patients for schizophrenia (STOPS)". *British Journal of Psychiatry* 199.6 (2011): 467-472.

32. Carlsson G., *et al*. "Patients longing for authentic personal care: a phenomenological study of embodied caring knowledge". *Issues in Mental Health Nursing* 25 (2004): 191-217.

33. Chadda RK., *et al*. "Caregiver burden and coping: a prospective study of relationship between burden and coping in caregivers of patients with schizophrenia and bipolar affective disorders". *Social Psychiatry and Psychiatric Epidemiology* 42.11 (2007): 923-930.

34. Swan RW and Lavitt M. "Patterns of Adjustment to Violence in Families of the Mentally Ill". *Journal of Interpersonal Violence* 3 (1988): 42-54.

35. Morin CM., *et al*. "Nonpharmacologic treatment of chronic insomnia". Sleep 22.8 (1999): 1134-1156.

36. Ryan MP. "The antidepressant effects of physical activity: Mediating self-esteem and self-efficacy mechanisms". *Psychology and Health* 23.3 (2008): 279-307.

37. McManamy J. "Living well with depression and bipolar disorder: What your doctor doesn't tell you…that you need to know". *NY: HarperCollins* (2006).

38. Miklowitz D J. "The bipolar disorder survival guide". *NY: The Guilford Press* (2002).

39. Berk L., *et al*. "Living with bipolar: A guide to understanding and managing the disorder". *NSW: Allen and Unwin* (2008).

Volume 2 Issue 6 March 2017