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Editorial

The problem of addiction and substance abuse among physicians has been reported as early as 1869 [1]. But, medical community is generally reluctant to accept and report the problem of addiction among health care professionals. Anaesthesiologist by virtue of their work profile and easy accessibility of potentially addicting drugs are at an increased risk of drug addiction. The incidence of abuse is estimated to be around 1% in faculty members and 1.6% of residents in training programs [2]. As high as $1/4^{th}$ of the medical professionals reported for abuse are anaesthesiologists.

A number of theories are suggested to explain an increased incidence of drug addiction in anesthesiologist as compared to other professionals. These include easy availability of drugs, stressful environment, the nature of their job along with family tendency and genetic predisposition [3,4]. The anesthesiologist is involved in around-the-clock care to a variety of patients in giving perioperative care which requires collection and evaluation of data, development and implementation of strategies to maintain the desired safe patient status. These demands make the humans responsible to provide safe operations, stretch and strain their physiological system to the limits [5]. They are often faced with physical stress (confined space, extreme of temperature), psychological stress (relationship with surgeons, fear of complications and death of patient), mental stress (difficult patients due associated comorbidities or complex surgical intervention) and physiological stress (unwell resulting in the body using more energy fighting the illness and hence less energy to perform vital tasks, not having proper meals also result in not having enough energy and induces symptoms like headache and shaking, lack of sleep) [6-8].

Despite working 24/7/365 days in the operation theatre and intensive care unit, the patients hardly know about anesthesiologists and process of anesthesia. As result they feel burnout, emotional exhaustion, depersonalization, emotional instability, ineffectiveness, unhappiness and dissatisfaction at work. This burn out syndrome may lead to marital problems, emotional disorders, decreased empathy and psychological withdrawal from work [7,8]. In addition to above easy availability of drugs to anesthesiologist makes them prone to substance abuse.

Editorial

Addiction in Anaesthesiologists and its Implications on Anaesthesia

The commonly abused drugs include opioids (morphine, fentanyl and sufentanil), propofol, ketamine, sodium thiopental, lidocaine, nitrous oxide, and the potent volatile anaesthetics [9].

Opioids are implicated in 2/3rd of all the cases followed by anesthesia induction agents (20%) [10]. Nitrous oxide has been often misused by professionals, but it is gradually been withdrawn from the hospital use due to its side effects. In near future its abuse potential among anesthesiologists may decrease [11,12]. The abuse of volatile anaesthetics among anaesthesiologists is difficult to detect and such individuals are addicted to more than one agents [13]. The misuse of ketamine among anaesthesiologists is increasingly being reported [14].

There is a higher incidence of death among substance-abusing anaesthesiologists due to the high potency and low therapeutic windows of drugs available for abuse to them like opioids, propofol, and volatile anesthetics [15,16].

Impaired anaesthesiologist may be difficult to identify because they believe they are immune to developing a substance use disorder, are good at hiding signs and symptoms and tend to self diagnose and treat themselves without seeking professional help. Physical, emotional and behavioural alterations often occur before deterioration in clinical performance [17,18]. The change in behaviour like absenteeism from work, arriving late consistently, missing appointments with patients and conflicts with colleagues should raise the suspicion of a possible substance use disorder. Physical symptoms may include changes in sleeping and eating patterns, changes in personal hygiene, signs of physical deterioration, mood swings, personality changes and social and professional isolation [19,20].

Addiction to drugs impairs the health care professional and they may not be able to practise their profession according to acceptable standards. This can put the life of the patients in danger and affect their postoperative outcomes. Moreover an anesthesiologist working under the influence of drugs increases the professional liability for himself and his group in case of lawsuit.

There are limited reports in literature suggesting any evidence of patient harm or claims arising from it due to substance abuse among anaesthesiologists [21,22].

A number of countries have developed facilities to take care of addicted physicians. An anesthesiologist addicted to drugs should be immediately referred to an addiction psychiatrist for management. Depending on the drug abused and severity their treatment modality may vary from intensive monitoring to residential treatment. The treatment generally includes detoxification, frequent testing for drug levels in body (urine, hair), psychotherapy and help from



support groups [3]. After reforming these anaesthesiologist need to be monitored for absenteeism and their professional behaviour should be observed. Whether these personnel should be allowed to return to active work is debatable. Recent literature suggests a graded reintroduction of the person into active work after approval from the treating psychiatrist should be tried [23].

Anaesthesiologists with baseline psychiatric disorder with opioid dependence and familial history have an increased risk of relapse following reforming. Relapse generally occurs in early period and can be avoided by avoided by delaying the re-induction of such professional into practise [24,25].

To reduce the addiction among anesthesiologist, a comprehensive approach is required to improve their overall working condition. We should have strict regulations to limit the number of work hours per week/month. The maximum duty at a stretch should not be more than 12 hours. Incentives like 5 days a week and compulsory paid holidays every 6 months or so should be provided. Stress management workshops should be conducted at regular intervals to help manage stress full lives. All anesthesiologists should undergo a scheduled mental and physical health check up every year to ensure their fitness and detect early signs of illness.

Addiction is an occupational hazard for those involved in the practice of anaesthesiology. It is difficult to identify the affected physicians, so we must screen all the anestehsiologits for their mental health periodically. The impaired physicians should be supported to get treatment, drug tests, counselling and financial support till they are reformed. All the health care facilities should have written policy for prevention and management of abuse among anesthesiologits.

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