



Knowledge and perceptions regarding Bariatric Surgery among Surgical Interns in Southern Rajasthan

Dr Mathura Prasad Agrawal*, Dr Anurag Pateriya*, Dr Surendra K Samar**

*Assistant Professor

**Associate Professor

Dept of General Surgery, Pacific Institute of Medical Sciences, Udaipur Rajasthan

Corresponding Author: Dr Anurag Pateriya, Dept of General Surgery, Pacific Institute of Medical Sciences, Udaipur Rajasthan

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ABSTRACT:

Obesity is defined as a BMI of 30 or above. This is a condition in which fat accumulation occurs in the body and is influenced by genetic as well as external factors. The condition of obesity will lead to the development of co-morbidities such as diabetes, hypertension, cardiac ailments among others which impact the life expectancy as well as quality of life of the patient. The present study was designed to ascertain the knowledge and perception of interns regarding bariatric surgery through a questionnaire submitted anonymously. The results showed that despite a awareness of bariatric surgery, the perception of students remained elusive as regards to referrals and complications. This can be improved by targeted approach at undergraduate level.

Keywords: Bariatric Surgery, Interns, Knowledge, Obesity.

I. INTRODUCTION:

Globally and more evidently in developed countries, the epidemic of obesity has increased at a rapid rate. In north American countries, it was reported that one in every four individuals is obese.^{1,2} The diagnosis of obesity is done as per the WHO, which defined obesity as being a BMI greater than 30. This elevated BMI among both genders is uniform is now proven to have a wide range of contribution in development of morbidities which are chronic such as hypertension, cardiac ailments, osteo-arthritis etc.³

Obesity is not a singular entity that afflicts but is rather a combination of various syndromes that accumulate over time due to metabolic, genetic, socio-cultural or environmental etiologies. The effects on an obese person include not merely the physical difficulties but also include emotional and societal stigma.⁴

The loss of weight arising from various modes has shown to reduce the co morbidities associated with obesity to a certain extent. The

various modalities used for weight loss include non invasive ones such as lifestyle modifications, dietary restriction and exercise however in morbidly obese and genetically predisposed individuals, this is not extremely effective.⁵ In recent times, a newer modality has become popular for such morbid obese cases, namely the advent of bariatric surgery. The weight loss post surgery is an average of 20-30 kilograms and has proven sustainable in the long term for subjects.⁶

The fair results have led to an increase in awareness regarding surgical management of obesity among the medical practitioners as well as general populace. The number of surgeries in field of bariatrics is growing and practitioners are likely to come across patients who want to undergo the procedure. The perception and awareness among non specialist doctors plays a important role in guiding a patient to the bariatric surgeon. This study was undertaken with an objective to ascertain the opinions and knowledge of non specialist doctors with regards to bariatric surgery and its various facets. This can provide an idea on targeted strategies that need to be developed to train the family physician on guiding a prospective patient.

II. METHODOLOGY:

The study is an observational, non interventional, questionnaire based survey which was undertaken among interns posted in dept of general surgery at pacific institute of medical sciences. The questionnaire was posted on google forms forum and link was distributed among the interns. They were made aware of the voluntary nature of the survey and that they have to maintain anonymity in their name while submission. The survey was conducted over a period of 6 months and received 90 responses. The responses were tabulated in an MS Excel Data sheet and subjected to statistical analysis. Institutional ethical clearance was obtained prior to starting the study.



III. OBSERVATIONS.

The survey consisted of 90 responses submitted over a period of 6 months. The mean age of the subjects was 22 years. The majority of responders were male (n=50) while rest were females. All questionnaires were completely filled.

All the respondents were aware (100 %, N=90) of the practice of bariatric surgery and had seen at least one case of surgery in their medical tenure. 88% respondents were aware of the use of laparoscopic procedures in bariatric surgery. The question on whether they were aware of various types of bariatric surgery, 95 % (N= 86) responded affirmatively. On being asked about the indications of bariatric surgery, 91 % respondents (N= 82) stated that they were aware, while the rest were unsure. Only 74 % (N=67) were aware of bariatric surgery centres in the locality of their residence apart from the present center. In terms of knowledge regarding common complications post surgery in bariatrics, 64% (N=58) were able to correctly assert the same.

The majority of subjects stated that genetics plays a major role in obesity (88%, N= 80) apart from lifestyle factors. The interns did agree that in morbid obesity with complications, the use of surgical intervention provided a gold standard in fast weight loss and relief. All the subjects agreed that bariatric surgery is inadequately represented in their teaching curriculum. The question on whether they thought that surgery is the first option yielded mixed results with 56 % (N= 51) agreeing but rest disagreeing. On being asked if they would be comfortable referring a case for bariatric surgery, 85 % (N=77) responded in the affirmative.

IV. DISCUSSION:

Bariatric surgery induces significant and sustained weight loss and subsequently reduces obesity-related comorbidities. However, only a small percentage of patients with severe obesity undergo bariatric surgery. There is limited knowledge about the experiences with and possible reservations to bariatric surgery among healthcare providers. This was seen in our study wherein the number of interns feeling comfortable for referrals and awareness of centres was lower. This is in concurrence with studies by Elliot AF et al and Lopez EK et al wherein the authors stated that the low prevalence of potentially life saving surgery was due to lack of awareness and apprehensions among the frontline medical workers.^{7,8}

The interns were aware of the practice of bariatric surgery and has also been observers in such a case on at least one occasion. Despite this,

the interns were still sceptical of referrals. They stated that their present curriculum was not displaying adequate information on bariatric surgery at the non specialist level. This is also reflected in articles by Avidoe Still C et al and Balduf LM et al wherein the authors stated the due to an inadequate knowledge among primary care physicians, the number of referrals to a bariatric surgeon is reduced. The attitude and knowledge of the first contact doctor can lead to a wider acceptance and thus provide a faster referral.^{9,10}

This is also a factor which possibly has lead to a fall in awareness of complications specific to bariatric surgery among these interns. The study by Abouhamda, A.S et al in Saudi Arabian population revealed that 31 % of patients who underwent any bariatric procedure were not told of the possible complications or were told of a minor number of them. This can be possibly due to the lack of knowledge among junior doctors of the complications.¹¹

Summarily, despite being an undergraduate in medical sciences, the core awareness of bariatric surgery and its complications needs to be improved among the primary care physicians. The perception and referral options must be supplemented with adequate knowledge and evidences.

V. CONCLUSION:

- Undergraduate medical curriculum must have an enhanced focus on bariatric surgery owing to the increase in number of cases of morbid obesity and its complications.
- Training and awareness initiatives must be implemented at level of interns and residents to promote an atmosphere conducive to choosing bariatric surgery when indicated.

The study is limited by the low number of respondents, it is the opinion of the authors that a wider base of students may provide a clearer picture of awareness and perceptions regarding bariatric surgery among doctors.

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