The spectrum of Non-alcoholic fatty liver disease (NAFLD) in nursing staff.

1) Charan Bagga, 2) Rajesh Sarode, 3) Sunil Kumar

1] Postgraduate Resident, Department of Medicine, Jawaharlal Nehru Medical College, Datta Meghe Institute of Medical Sciences (Deemed To Be University), Wardha,
Email: drcharanbagga@gmail.com, 8587031111

2] Professor- Department of Medicine, Jawaharlal Nehru Medical College, Datta Meghe Institute of Medical Sciences (Deemed University), Wardha, 9422144819

3] Professor and Head Department of Medicine, Jawaharlal Nehru Medical College, Datta Meghe Institute of Medical Sciences (Deemed University), Wardha,
Email: sunilkumararmed@gmail.com, 9850393787

Charan Bagga,
Department of medicine, Jawaharlal Nehru Medical College, Datta Meghe Institute of Medical Sciences (Deemed university), Wardha
Corresponding author’s email id: drcharanbagga@gmail.com,
Contact number of the corresponding author: 8587031111

Type of Article: Study Protocol
Conflict of Interest: None

Abstract: Background: Looking at non-alcoholic fatty liver infection anthropometric and biochemical profile with clinical profile and hazard factors. Presentation of NAFLD is asymptomatic with liver compounds then it advances to cirrhosis later. Commonest reason for NAFLD is cirrhosis of liver, however reason for essential NAFLD is related with disabled glucose tolerance, obesity, hypertension, secondary NAFLD and is related with hypothyroidism, git surgeries, toxins. This study is aimed to see commonness in understanding with comorbidities albeit accurate aetiology of NAFLD ailment isn’t known, as studies in regards to this in India is inadequate.

Objective: To correlate profile & anthropometry of patients of NAFLD

Methodology: This will be a Cross sectional study consisting of a series of 125 nursing staff consecutively diagnosed cases of NAFLD patients presented to the Datta Meghe Institute Of Medical Science, Wardha. All cases will undergo detailed history taking, physical examination, anthropometry, detailed biochemical workup, radiological assessment and in selected patients histological evaluation. Data of these patients regarding clinical, lab parameter and investigative findings will be noted.
Result and Conclusion: According to previous studies its has been noted that 20% prevalence is seen in nursing staff, this study is being conducted in an effort to determine the effect of NAFLD in the nursing staff.
Keywords: Fatty liver, hypertriglyceridemia, metabolic syndrome

Title of Study/article: The spectrum of Non-alcoholic fatty liver disease (NAFLD) in nursing staff.

INTRODUCTION
It is progressively perceived that NASH represents as extent of "cryptogenic" or "idiopathic" cirrhosis. Basic NAFLD every now co exists together with one component of the metabolic issue (debilitated glucose obstruction, hypertension, hypertriglyceridemia, low high-thickness lipoprotein [HDL] cholesterol) [1,3]. Investigating pathophysiology background of the metabolic syndrome, insulin resistance and visceral obesity are recognized as main factors of risk. It could be pointed out that insulin resistance is core and obesity most frequent clinical manifestation. [2] Early recognition of the metabolic syndrome is of great importance for atherogenesis which starts on the very beginning of the process, jointly with other multiple factors proceeds towards diabetes mellitus (DM) type 2, arteriosclerotic complications [4]. Patients with non-alcoholic fatty liver disease, adults and kids typically meet analytic standards for metabolic condition (abdominal fat statement, hypertension, dyslipidaemia and increased blood sugar) high risk factor for cardiac disease[5,6]. Our current cross sectional investigation will target exploring the commonness of NAFLD, clarifying the relationship of NAFLD with age, sex, metabolic factors, and recognizing novel metabolites related with NAFLD hazard, by means of clinical assessment, anthropometric appraisal and focused on metabolomics. Weight estimations, abdomen line estimations (VC) mid hip proportion, bio electrical impedance examination (BIA) are generally suggested in patients with NAFLD as indicative apparatuses, for being agreeable and moderately[7].

Aim and Objectives: To study the spectrum of Non-alcoholic fatty liver disease in nursing staff. To correlate the clinical profile and predisposing factors of patients with NAFLD. The correlate the anthropometric and biochemical profile of patients with NAFLD.

Methodology:
This will be a Cross sectional study consisting of a series of 125 nursing staff consecutively diagnosed cases of NAFLD patients presented to the Datta Meghe Institute Of Medical Science, Wardha. This is a rural medical teaching institute in central India. In Acharya Vinoba Bhave Rural hospital with influx of 150 patients in medicine opd. All cases will undergo detailed history taking, physical examination, anthropometry, detailed biochemical workup, radiological assessment and in selected patients histological evaluation. Data of these patients regarding clinical, lab parameter and investigative findings will be noted. [8,9,] History of significant alcohol intake and Presence of a positive viral marker (HBsAg positive, anti-HCV positive) [10,13], Patients of autoimmune hepatitis, hemochromatosis Wilsons disease, Patients receiving concurrent medications, such as high dose hormonal replacement therapy, steroids, were excluded from the study[12,15]. A thorough history will be taken with special emphasis to exclude any history of high risk behavior, any history of blood transfusion in the past and significant alcohol intake[16,17]. Venous blood test will be taken from all members after 12 h of fast, and afterward sent to the research facility of the unit around the same time[11]. Parameters including hepatic proteins, for example, liver and kidney function test, gamma-glutamyl transferase (GGT) just as the lipid profile including triglyceride (TG), all out cholesterol (TC), high thickness lipoprotein cholesterol (HDL-C), low-thickness lipoprotein cholesterol (LDL-C), and fasting glucose (FBS) will be analyzed by quantitative indicative pack and explored through photometric technique[14].
ultrasonography will be performed by ultrasonix gadget from sonix SP arrangement utilizing a profound test of 3.5–5 MHz to recognize fatty liver and affirmed by two radiologists. In view of the sonography discoveries, greasy liver will be sorted into three evaluations: Grade 1 (mellow): raised echogenicity of liver parenchyma with noticeable periportal and stomach; Grade 2 (moderate): raised echogenicity of liver parenchyma with impediment of the dividers of the gateway vein branches, without stomach blockage; Grade 3 (serious): raised echogenicity of liver parenchyma with imperceptible periportal echogenicity detailed[15]. Clinical examination and anthropometric measurements will be carried out to categorise the patients into Hypertensive, over weight and obese (18-20).

Study design: A hospital based prospective observational cross sectional study, Study Duration: 2 year, Study area: The study was done at our tertiary care centre in wards of the Department of General Medicine. Study population: 125 consecutive nursing staff with NAFLD admitted in the department of General Medicine who fulfilled the inclusion criteria. Sample size: 125 patients

**Expected outcomes:**

According to previous studies it has been noted that 20% prevalence is seen in nursing staff, this study is being conducted in an effort to determine the effect of NAFLD in the nursing staff in AVBRH hospital using the USG technique and blood investigations such as FLP,HBA1C,FBS,PMBS.

**Discussion:**

NAFLD in nursing staff we can get patients on the basis of medicine OPD and IPD, age should be more than 40 years and high risk factor should be there such as central obesity, pre diabetic, insulin resistance, my inclusion criteria will be all nursing staff of AVBRH age above 40 years and the exclusion will be nursing staff on mediation such as(steroids, anticancer, hormonal replacement therapies) or having autoimmune disorders or alcohol abuser, or having viral markers positive.

**REFERENCES**


