

MASLD: An Overview of Metabolic Dysfunction-Associated Steatotic Liver Disease

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Metabolic dysfunction-associated steatotic liver disease (MASLD) is present in an estimated 25% to 30% of adults and more than 70% of people with diabetes.^{1,2} Management of MASLD includes identifying those at risk for cirrhosis and addressing comorbid cardiometabolic risks, including obesity, prediabetes or diabetes, hypertension, and dyslipidemia.

Table 1. New Nomenclature (June 2023)³

New Term	Previous Term	Signs
Metabolic dysfunction-associated steatotic liver disease (MASLD)	Non-alcoholic fatty liver disease (NAFLD)	Hepatic steatosis plus >1 cardiometabolic risk factor
Metabolic dysfunction-associated steatohepatitis (MASH)	Non-alcohol related steatohepatitis (NASH)	>5% hepatitis steatosis with associated inflammation and hepatocyte injury
MASLD with alcohol consumption (MetALD)		Alcohol intake: <ul style="list-style-type: none"> Female: >140-350 g/week or 20-50g/day Male: >210-420 g/week or 30-60g/day

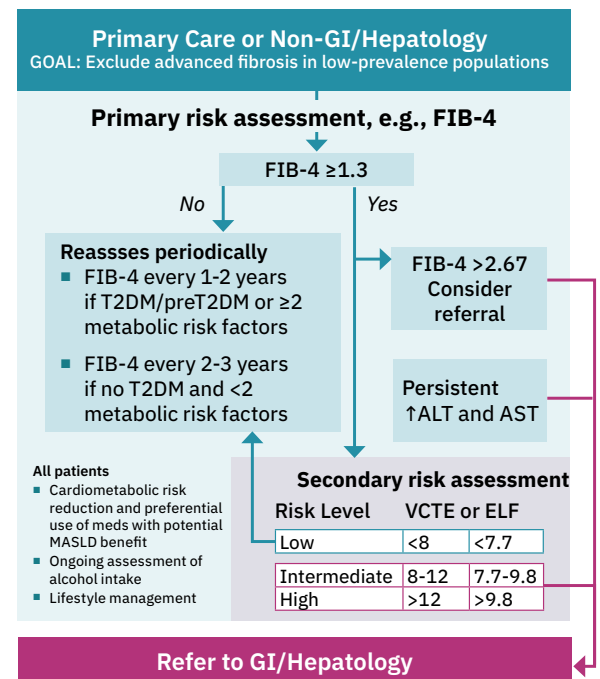
Evaluation

- Primary risk assessment includes **Fibrosis-4 Index for Liver Fibrosis (Fib-4)** calculation, followed by secondary risk assessment in those with a high primary risk score (Figure 1).¹

Treatment

- Lifestyle changes, including weight loss; dietary modifications; exercise; and/or bariatric surgery are indicated to improve steatohepatitis.¹
- Statins should be continued in patients with MASH to address cardiovascular risks.¹
- Resmetirom, a liver-specific thyroid hormone receptor beta-selective agonist, is approved for the treatment of MASH with moderate-severe fibrosis.⁴
- Other therapies shown to improve MASH histology:
 - Glucagon-like peptide-1 receptor agonists (GLP-1 RA)
 - Pioglitazone
 - Sodium-glucose cotransporter-2 inhibitors (SGLT2i)
 - Vitamin E-800 IU/day (for patients without diabetes)¹
- A multidisciplinary approach that incorporates individual and structural barriers, including social determinants of health, is recommended.

Figure 1. Clinical Suspicion for Metabolic Dysfunction-Associated Steatotic Liver Disease



ALT = alanine aminotransferase; AST = aspartate aminotransferase; ELF = enhanced liver fibrosis score; T2DM = type 2 diabetes; VCTE = vibration-controlled transient elastograph.

Adapted from AASLD practice guidance on the clinical assessment and management of nonalcoholic fatty liver disease

For more information, access Cardi-OH's [expanded resource on MASLD](#).

References

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