# CIRRHOSIS CARE

## CIRRHOSIS DIAGNOSIS

Cirrhosis is often diagnosed by a combination of medical history, blood tests and imaging. Liver biopsy is rarely needed. Elevated APRI > 1.5 or FIB-4 > 3.25 have high positive predictive values for cirrhosis. Ultrasound showing scalloped or nodular liver or enlarged spleen support the cirrhosis diagnosis. Also, FibroScan and MRE tests can add support for cirrhosis diagnosis based on liver stiffness. Stigmata of liver disease such as esophageal varices, hepatic encephalopathy, and ascites indicate decompensated cirrhosis.

All cirrhotic patients should be assessed at every visit for alcohol use with AUDIT-C, advised to abstain from alcohol, and referred to treatment if indicated.

https://www.integration.samhsa.gov/images/res/tool auditc.pdf

## CIRRHOSIS COMPENSATED VERSUS DECOMPENSATED

Compensated – Child-Turcotte-Pugh (<a href="https://www.hepatitisc.uw.edu/page/clinical-calculators/ctp">https://www.hepatitisc.uw.edu/page/clinical-calculators/ctp</a>)
Uses bilirubin, albumin, and INR, and history of ascites or hepatic encephalopathy.

A score of 5-6 is Class A, compensated cirrhosis.

A score of 7-9 is Class B (moderately severe); 10 and above is class C (most severe). Class B and C scores indicate decompensated cirrhosis.

## CIRRHOSIS COMPLICATIONS

<u>Hepatic Encephalopathy (HE)</u> – Treat with lactulose and dose to 2-3 soft bowel movements daily or Rifaximin 500mg twice daily. You can add on Rifaximin if lactulose alone is not sufficiently treating HE.

<u>Ascites</u> – Do diagnostic paracentesis for new onset, or if patient admitted to hospital or has a change in clinical status. Sodium restricted diet 2000mg/day. Treat with a single morning dose of spironolactone and furosemide, pending BP tolerability, starting with spironolactone 100mg daily and furosemide 40mg daily. Escalate dose every 3-5 days if needed. Monitor potassium and renal function with every dose change.

<u>Varices</u> – For bleeding prophylaxis give carvedilol 6.25mg daily, after 3 days increase to 6.25mg BID. Alternatively, nonselective beta blockers such as propranolol 20-40mg twice daily increasing every 2-3 days to max 320mg if no ascites and 160mg/day if ascites, or nadolol 20-40mg daily adjusting every 2-3 days max dose 160mg without ascites and 80 mg/day if ascites. Goal is resting HR of 55-60/min and systolic BP  $\geq$  90. No need for follow-up EGD if on prophylaxis. After variceal bleed, endoscopic variceal ligation should be done every 2-8 wks with follow-up EGD until eradication of varices.

## ROUTINE LABS/DIAGNOSTICS

CMP q6months with yearly CBC, PT/INR.

RUQ US and AFP every 6 months. This is to screen for hepatocellular carcinoma.

EGD if decompensated cirrhosis or if platelets < 150,000 or FibroScan fibrosis score  $\geq$  20.

## VACCINATIONS

Check hepatitis A and B immune/vaccine status and vaccinate if needed

Pneumoccocal vaccination

Yearly Flu vaccine

Plus other routine adult vaccinations

## DIETARY RECOMMENDATIONS

Daily energy intake 35-40 kcal/kg ideal body weight

Protein (1.2-1.5g/kg/day)

Eating a balanced diet including vegetables, fruits, fiber-rich whole grains, and lean proteins (such as fish, chicken, caribou, moose) is recommended. Do not eat processed and fast foods.

Because the cirrhotic liver cannot store energy well, small meals or liquid supplements throughout the day. Recommend a late night snack and breakfast upon arising. No skipped meals. Consider an oral branched-chain amino acid supplement.

In cirrhosis, the kidneys hold on to sodium and this results in the body holding more fluids leading to edema, ascites. Sodium  $\leq$  2000mg/day is recommended. Note: 1 teaspoon salt = 2,325 mg sodium.

Avoid raw or undercooked meats or seafoods since cirrhosis causes immune dysfunction and increases risk of infections.

## GOT A QUESTION? WHO TO CALL

Liver Disease & Hepatitis Program – 907-729-1560 and ask for a provider or nurse.