

in muscle mass and functional deterioration. CT determination of muscle mass is not easily accessible in routine clinical practice, so practical measurement tools are essential. It has been proposed to classify sarcopenia as severe when decreased muscle strength, muscle mass, and low physical performance coexist. The impact of severe sarcopenia on the risk of developing hepatic encephalopathy is currently unknown. Primary outcome: Determine if there is a significant correlation between the degree of sarcopenia and hepatic encephalopathy. Secondary outcomes: to determine the prevalence of sarcopenia in patients with cirrhosis, the association between sarcopenia and liver decompensation events, to determine the correlation between individual tests (battery of functional physical performance tests [SPPB], grip strength, and skeletal muscle mass) with hepatic encephalopathy.

Materials and methods: Prospective, cross-sectional, observational, descriptive, and analytical study in patients with liver cirrhosis evaluated by outpatient consultation, with diagnosis confirmed by transitional elastography (Fibroscan® 502 ECHOSENS® equipment). The presence of sarcopenia was determined by measurement of grip strength with a hand-held hydraulic dynamometer (JAMAR® B001D7QDJG) and determination of muscle mass by tetrapolar electrical bioimpedance (OMRON® HBF 500). A positive case was considered when coexisting force ≤ 27 kg / ≤ 16 kg and skeletal muscle mass ≤ 20 kg / ≤ 15 kg in men and women respectively, classifying it as severe sarcopenia with a score of ≤ 8 pts in SPPB. The presence of hepatic encephalopathy was determined by clinical evaluation and critical flicker rate (cut-off < 39 Hz). Logistic regression analysis and Chi-square test were performed.

Results: 96 patients were included, of which 35 (36.4%) had sarcopenia and 21 (60%) were classified as severe sarcopenia. The demographic characteristics and severity of cirrhosis were comparable in patients with and without sarcopenia. In multivariate logistic regression analysis, a significant correlation was demonstrated between the presence of sarcopenia and manifest hepatic encephalopathy $p = 0.014$, HR 9.05, 95% CI (1.54-52). No significant correlation was shown with ascites ($p = 0.08$) or recent variceal bleeding ($p = 0.53$). A significant correlation was demonstrated between previous events of encephalopathy ($p = 0.021$) and ascites ($p = 0.032$) with the presence of sarcopenia. Regarding individual tests, a SPPB score ≤ 8 was independently associated with overt encephalopathy (0.009, HR 19.7, 95% CI (2.1-182). Handgrip strength, chair stand, and muscle mass were not statistically significant.

Discussion and Conclusions: This pilot study suggests that the presence of sarcopenia is significantly correlated with the risk of developing overt hepatic encephalopathy, and the presence of previous ascites could increase the risk of developing sarcopenia. Evaluation of physical performance by SPPB could be independently correlated with the development of hepatic encephalopathy.

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PREVALENCE AND CHARACTERISTICS OF PORTAL VEIN RECANALIZATION IN CIRRHOTIC PATIENTS ADMITTED WITH PORTAL THROMBOSIS IN A THIRD LEVEL CARE CENTER

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Introduction and Objectives: Portal vein thrombosis (PVT) refers to the formation of blood clots within the trunk of the portal vein

(PV) or its main branches, which can spread to the superior mesenteric (SMV) and splenic (VE) veins. The natural history of liver cirrhosis is a complication with a "rebalanced" coagulation system that can promote bleeding or a thrombotic tendency. The prevalence in compensated cirrhotic is 1% in and 8-25% in decompensated patients.

Aim: To determine the prevalence and characteristics of PV recanalization in cirrhotic patients with PVT.

Material and methods: Descriptive, cross-sectional/prevalence.

Procedure: We reviewed medical records of all cirrhotic patients admitted with PVT diagnosis from January 2019 to April 2021. We included patients with a diagnosis of PVT. Qualitative variables were expressed as frequencies and percentages. The numerical variables were expressed as means and standard deviations. We use X2, Fisher's exact, Student's t, and Mann-Whitney U to compare groups as appropriate.

Results: Of 553 cirrhotic patients admitted from January 2019 to April 2021, 48(8.67%) patients with PVT diagnoses were included. Of these, 27(56.3%) were women, with a mean age of 59.37 ± 12.67 years, 9(18%) with a diagnosis of cancer, of which 8(16.7%) were hepatocellular carcinoma, 2(33.3%) extended to the two arms, 6(12.5%) received treatment, 100% of the treatment was based on low molecular weight heparin. According to the degree of recanalization: 37 (77.08%) recanalized, 27(56.3%) did so partially, of them, 24(88.9%) were spontaneous; 10(20.8%) recanalized utterly, of which 90% were without treatment, with no significant difference between recanalization to free progression vs. treatment ($p = 0.179$) and 11(22.9%) did not recanalize. Regarding the characteristics of the thrombosis by imaging studies, 26(54.2%) were chronic, 28(58%) partial, only 9 (18.8%) with cavernomatous transformation, 30(62.5%) were located in the main trunk, 6(12.5%) extended to the SLM and 11(22.9%) presented flow < 15 cm/s.

Discussion: In cirrhotics with recent or partial occlusion ($> 50\%$ of the lumen) or thrombosis of the main PV or SMV, therapy should be considered. Anticoagulant or interventional therapy has no benefit complete chronic occlusion of the main PV or cavernomatous transformation. Spontaneous recanalization occurs in 40% in 3 months, and with therapy, it is 80%. Several cohort studies reported that near 50% recanalize partially or totally in the next three months, and up to 80% recanalize at 12 months. Clinical trial data are weak regarding the indications for treatment for PVT without ischemic symptoms. Our study showed that 77.08% of cirrhotic patients with PVT recanalized, most partially during follow-up and more than 80% spontaneously, and only a low percentage presented with cavernomatous transformation. In addition, more than 70% of the patients who recanalized have a low risk of re-thrombosis related to flow.

Conclusions: The prevalence of PVT in cirrhotic patients was relatively low (10%), complete or partial recanalization was very high, even spontaneously, there was no difference in the degree of recanalization with or without anticoagulation.

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INITIAL EVALUATION OF KIDNEY FUNCTION IN PATIENTS WITH LIVER CIRRHOSIS OF CEIHET, HIDALGO

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Introduction and Objectives: Kidney injury has become one of the main causes of decompensation in cirrhotic patients. There are few studies in our country that compare various methods to assess kidney function in these patients. Objective: To evaluate the initial renal function in patients with liver cirrhosis from CEIHET, Hidalgo.

Material and methods: Observational, cross-sectional, retrospective and analytical study, selecting 186 files with a diagnosis of liver cirrhosis, from January 2020 to June 2021, evaluating renal function (MDRD-6, 24-hour urine creatinine clearance, KDIGO / CKD and Serum cystatin C) at the initial check-up appointment. Statistical analysis was performed through measures of central tendency, dispersion and correlation.

Results: 186 files were analyzed, 53.2% (n = 99) women; mean age of 63 years and a mean time since the diagnosis of cirrhosis of 2.2 years. 117 patients (63%) Child Pugh A. The main etiology of cirrhosis was metabolic fatty liver in 110 patients (53.8%). At the time of the first visit, 140 patients (75.3%) had serum creatinine levels between 1 and 2 mg/dl, with a mean of 1.3. Regarding 24-hour urine creatinine clearance, 93 patients (50%) showed levels greater than 90ml / min, and 47 (25.2%) had levels less than 45ml / min. When measuring filtration rate by MDRD-6, 86 (46.4%) showed levels higher than 90ml / min, and 40 (21.5%) had levels lower than 45ml / min. Regarding KDIGO / CKD, 100 individuals (53.8%) showed rates greater than 90ml / min, and only 27 (14.5%) rates less than 45ml / min. In serum Cystatin C, 103 (55.5%) had levels between 1 and 1.5mg / L, and 50 (27%) showed levels greater than 1.5mg / L. When comparing the various measurements, there was only a statistical difference between KDIGO / CKD and the other scales, showing a lower rate of detection of initial kidney injury (p 0.008, 0.07 and 0.04). In total, 89 (48%) of the patients had creatinine clearance less than 60ml / min at the initial consultation. Discussion. In our study, almost half of the patients with cirrhosis present a degree of kidney damage from the first visit to Hepatology. It was impossible to determine whether it is acute, exacerbated chronic, or definitive chronic disease. The use of 24-hour urine creatinine clearance, serum cystatin C, and MDRD-6 is helpful since serum creatinine levels alone erroneously estimate the degree of kidney injury in these patients. We essentially consider the initial kidney function evaluation in all cirrhotic patients to identify probable causes and treat them.

Conclusions: We found that up to 48% of patients with liver cirrhosis present some degree of kidney injury at the time of their first consultation with Hepatology. 24-hour urine creatinine clearance, serum cystatin C, and MDRD-6 appear useful in evaluating renal function in these patients.

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IMPACT OF REFRACTORY ASCITES ON THE SURVIVAL OF PATIENTS WITH CIRRHOSIS

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Introduction and Objectives: Refractory ascites is an infrequent complication in patients with cirrhosis; it is considered in those who do not respond to diuretics or who have adverse effects with diuretics. Treatment is large-volume paracentesis, followed by plasma

volume expansion to prevent paracentesis-induced circulatory dysfunction (PICD) to avoid deterioration in renal function and hyponatremia. Intermittent paracentesis could increase morbidity and mortality in these patients. Perhaps the classic prognostic scales, such as MELD, undervalue this factor that is not usually considered for prioritizing transplantation. The objective of this study is to assess the survival of patients with cirrhosis with refractory ascites.

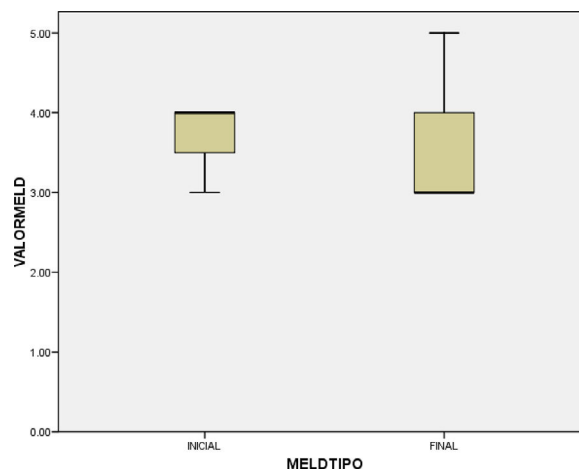
Material and methods: Observational, retrospective, descriptive and analytical study. Patients with cirrhosis and refractory ascites were included, who were subjected to intermittent paracentesis on several occasions from February 2019 to June 2021. Descriptive statistics were performed with central tendency and dispersion measures, baseline and final MELD were calculated, and mortality was evaluated.

Results: Eleven patients were included, six men (54.5%) and five women (45.5%), aged 54 ± eight years. The patients had a range of paracentesis performed from 3 to 30 occasions (median five interventions), with a follow-up of 1 to 40 months (median of 8 months). The etiology of cirrhosis was alcoholic 63.6%, MALFD 9.1%, and 27.3% other causes. The total amount of fluid drained per patient was 37 to 439 L, 90% of the patients classified as Child-Pugh grade C, and 10% B. The median of the initial MELD was 15 (range = 13), and the median of the final MELD was 22 (range=17). There was no significant difference according to the Wilcoxon test p=0.317. The renal function between the first and the last paracentesis decreased mildly by 24% and from 36% to 45% severely. Overall mortality was six patients (54.5%). The causes of death were spontaneous bacterial peritonitis (SBP) 9%, ACLF (Acute on Chronic Liver Failure) 27%, infarction 9%, and sepsis 9%. Median survival was 18 months (range 13-23)

Discussion: Patients with refractory ascites have very high mortality (59%); Despite the amount of fluid drained, up to 439L in one patient (for example), it did not seriously affect kidney function overall. We found no statistically significant difference between the initial and final MELD values (Figure 1). However, the MELD score does not make them candidates for liver transplantation; therefore, refractory ascites should be considered with an additional score to enter them on the transplant list.

Conclusions: Refractory ascites is uncommon, but it has high mortality; the MELD scale may not accurately predict the possibility of death, so they should be entered with an additional score to consider them candidates for liver transplantation.

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