Materials and Methods: Thirty C57BL/6J male mice were divided into three groups: 1) control group: normal diet. 2) HF group: high fat diet (60%) and water with sucrose and fructose and 3) MexMix group (MexMix): HF diet until week 10 and for 8 additional weeks; HF diet pellets supplemented with 6.7% nopal, 8.7% cocoa and 8.7% cricket.

Results: Mice treated with MexMix decreased body weight, visceral and epididymal fat, and adipocyte size, as well as serum levels of triglycerides, insulin, leptin, and PAI-1; while adiponectin levels increased. Using 16S rRNA gene sequencing, MexMix was shown to increase phylogenetic diversity, Firmicutes abundance, and enrichment of 10 genera, including Lachnospiraceae, Ruminococcaceae, Akkermansia, and Eubacterium_coprostanoligenes_group, associated with multiple beneficial effects such as short-chain fatty acids (SCFAs) production. In the gut, MexMix supplementation increased significantly fecal SCFAs concentration, intestinal crypts depth, Ocln and Cldn1 expression, and decreased Il6 and Tnf-a expression. In liver, MexMix significantly reduced steatosis. Liver transcriptome in MexMix group showed an enrichment in histone H3K14 acetylation pathway. Using qPCR, we confirmed higher hepatic expression of Cat, Sod and lower expression of Tnfa and Pparg. In addition, MexMix diet decreased hepatic expression of miRNA-34a, miRNA-103, and miRNA-33a.

Conclusions: Supplementation with MexMix demonstrated its efficacy as a prebiotic, promoting growth of beneficial genera improving intestinal health. This suggests that MexMix could be a potential therapeutic strategy for treating MAFLD in patients, as well as other conditions linked to excessive consumption of fats and sugars.

https://doi.org/10.1016/j.aohep.2023.101271

O-22 EFFICACY OF ATEZOLIZUMAB BEVACIZUMAB TREATMENT FOR HEPATOCELLULAR CARCINOMA IN REAL-WORLD CLINICAL PRACTICE AT TWO TERTIARY HEALTHCARE CENTERS IN SOUTHERN BRASIL: FIRST INTERIM ANALYSIS

Hugo Cheinquer[1], Alexandre Araujo[1], Mario Alvares-Da-Silva[1], Cristina Cheinquer[2], Jerônimo Oliveira[1], Ana Luiza Silva[3], Rui Fernando Weschenfeller[3]

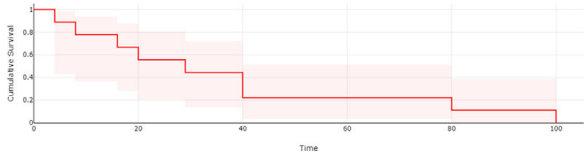
[1] *Gastroenterology Unit, Hospital de Clinicas de Porto Alegre, Porto Alegre, Brasil*
[2] *School of Medicine, UNISINOS, Porto Alegre, Brasil*
[3] *Oncology Unit, HOSPITAL MOINHOS DE VENTO, Porto Alegre, Brasil*

Introduction and Objectives: Atezolizumab and bevacizumab (Atez/Bev) are the new standard of care for first-line systemic therapy of hepatocellular carcinoma (HCC). Real-world data on safety and efficacy of Atez/Bev are scarce in Latin America. We aimed to describe safety and efficacy of Atez/Bev in patients with HCC Barcelona Clinic Liver Cancer (BCLC) B and C stages.

Materials and Methods: Prospective cohort study at two tertiary healthcare centers in Porto Alegre, Southern Brazil, included consecutive HCC patients within BCLC B or C stages started with Atez/Bev as first line therapy between 2020-2023. Demographics, tumor response, overall survival (OS), and adverse events were assessed.

Results: A total of 20 patients, 16 males (80%), all with cirrhosis (HCV 13, HBV 3, NASH 3, alcohol 1). Child-Pugh were A and B (17 and 3, respectively). Median MELD was 8 (IQR 7-10.5) and median age 70.5 years-old (IQR 61-72.8). Median baseline alfa-fetoprotein was 36.8 (IQR 6.6-2.696). Esophageal varices in 11 individuals (65%). Majority (19/20) was BCLC stage C and ECOG 0/1. Previous HCC treatment was surgery (n=2, 10%), radiofrequency ablation (n=1, 5%) or transarterial chemoembolization (n=10, 50%). Macrovascular invasion and extra-hepatic metastasis were detected in 9 (45%) and 5 (25%) patients, respectively. Median Atez/Bev cycles were 5.5 (IQR 3-8.8) and dose reduction occurred in 5 patients (25%). Tumor response was evaluated in 13 patients: partial response in 3 (23.1%), stable disease in 1 (7.6%), and progressive disease in 9 (69.3%). Median follow-up (last visit or death) was 31.5 weeks (IQR 16-47.5). Median OS was 55% (Fig 1). Cirrhosis decompensation occurred in 11/20 individuals (55%) with variceal bleeding in 5/20 (25%), which was the only significant variable associated with mortality (p=0.04).

Conclusions: Atez-Bev in a real-world cohort of intermediary and advanced HCC patients showed efficacy and safety comparable to published studies with similar inclusion criteria.



https://doi.org/10.1016/j.aohep.2023.101272

O- 23 STRATEGIES TO ELIMINATE HEPATITIS C VIRUS INFECTION IN THE AMERICAS

Luis Antonio Díaz[1], Sergio García[1], Rayan Khan[2], Gustavo Ayares[1], Javier Uribe[1], Francisco Idalsoaga[1], José Miguel Fuentealba[3], Eduardo Fuentes[1], Katherine Maldonado[4], Mariana Lazo[5], Catterina Ferreccio[1], Manuel Mendizabal[6], Melisa Dirchwolf[7], Patricia Guerra[8], Claudia P. Oliveira[9], Mario Guimarães[9], Mario Reis[10], Giada Sebastiani[11], Mayur Brahmania[12], Alnoor Ramji[13], Mina Niazi[14], Hin Hin Ko[13], Jordan Feld[15], Juan Carlos Restrepo[16], Wagner Ramírez[17], Omar Alfaro[18], Marlen Castellanos-Fernández[19], Enrique Carrera[20], José Roberto Aguirre Ayala[21], Abel Sánchez[4], Marco Sánchez[22], María Teresa Andara[23], Graciela Castro[24], Norberto Chavez-Tapia[25], Nahum Mendez-Sanchez[25], Enrique Adames[26], Julissa Lombardo[27], Marcos Girala[28], Elías Morán[28], Martin Padilla-Machaca[29], Javier Díaz[30], Martín Tagle[31], Victoria Mainardi[32], Nelia Hernandez[33], Edmundo Martínez[34], Edilmar Alvarado-Tapias[35], Roberto Leon[36], Andrew Talal[37], Emmanuel Thomas[38], Sandra Springer[39], Mauricio Garcia-Saenz-de-Sicilia[40], Wei Zhang[41], Jasmohan Bajaj[42], Elliot B. Tapper[43], Manhal J. Izzy[44], Robert G. Gish[45], Bashar Attar[46], Thomas G. Cotter[47], Michael R. Lucey[48], Patrick S. Kamath[49], Ashwani K. Singal[50], Ramón Bataller[51], Gabriel Mezzano[52], Alejandro Soza[1], Jeffrey V. Lazarus[53], Marco Arrese[1], Juan Pablo Arab[2]

[1] *Department of Gastroenterology, Pontificia Universidad Católica de Chile, Santiago, Chile*
[2] *Division of Gastroenterology, Department of Medicine, Western University & London Health Sciences Centre, Ontario, Canadá*
[3] *Facultad de Medicina, Universidad Finis Terrae, Santiago, Chile*
[4] *Hospital Roosevelt, Ciudad de Guatemala, Guatemala*
[5] *Dornsife School of Public Health, Philadelphia, Estados Unidos*

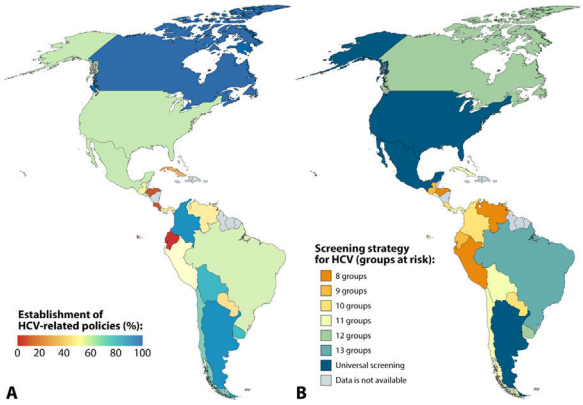
[6] Hospital Universitario Austral, Buenos Aires, Argentina
[7] Hospital Privado de Rosario, Rosario, Argentina
[8] Instituto de Gastroenterología Boliviano-Japonés, Cochabamba, Bolivia
[9] University of Sao Paulo School of Medicine, Sao Paulo, Brasil
[10] Hospital de Clínicas de Porto Alegre, Porto Alegre, Brasil
[11] McGill University Health Centre, Quebec, Canadá
[12] Univeristy of Calgary, Alberta, Canadá
[13] University of British Columbia, British Columbia, Canadá
[14] University of Saskatchewan, Saskatchewan, Canadá
[15] Toronto General Hospital, Toronto, Ontario, Canadá
[16] Hospital Pablo Tobon Uribe, Medellín, Colombia
[17] Clínica Equilibrium, San José, Costa Rica
[18] Hospital San Carlos, Ciudad Quesada, Costa Rica
[19] University of Medical Sciences of Havana, Havana City, Cuba
[20] Hospital Eugenio Espejo, Quito, Ecuador
[21] Instituto Salvadoreño del Seguro Social, San Salvador, El Salvador
[22] Hospital Escuela Universitario, Tegucigalpa, Honduras
[23] Instituto Hondureño de Seguridad Social, Tegucigalpa, Honduras
[24] Instituto Nacional de Ciencias Médicas y Nutrición "Salvador Zubirán", Mexico City, México
[25] Medica Sur Clinic & Foundation, Mexico City, México
[26] Hospital Santo Tomas, Ciudad de Panamá, Panamá
[27] Hospital Punta Pacífica, Ciudad de Panamá, Panamá
[28] Universidad Nacional de Asunción, Asunción, Paraguay
[29] Hospital Nacional Guillermo Almenara, Lima, Perú
[30] Universidad Nacional Mayor de San Marcos, Lima, Perú
[31] Clinica Anglo Americana, Lima, Perú
[32] Hospital Central de las Fuerzas Armadas, Montevideo, Uruguay
[33] Universidad de la República Uruguay, Montevideo, Uruguay
[34] Hospital Dr. Sótero del Río, Santiago, Chile
[35] Hospital de la Santa Creu i Sant Pau, Barcelona, España
[36] Instituto Médico La Floresta, Caracas, Venezuela
[37] University at Buffalo, New York, Estados Unidos
[38] University of Miami Miller School of Medicine, Miami, Florida, Estados Unidos
[39] Yale School of Medicine, New Haven, Connecticut, Estados Unidos
[40] University of Arkansas for Medical Sciences, Arkansas, Estados Unidos
[41] Massachusetts General Hospital, Boston, Massachusetts, Estados Unidos
[42] Virginia Commonwealth University and Central Virginia Veterans Health Care System, Richmond, Virginia, Estados Unidos
[43] University of Michigan, Ann Arbor, Michigan, Estados Unidos
[44] Vanderbilt University Medical Center, Nashville, Tennessee, Estados Unidos
[45] Loma Linda University, Loma Linda, California, Estados Unidos
[46] Cook County Health, and Hospital Systems, Chicago, Illinois, Estados Unidos
[47] UT Southwestern Medical Center, Dallas, Texas, Estados Unidos
[48] University of Wisconsin School of Medicine and Public Health, Madison, Wisconsin, Estados Unidos
[49] Mayo Clinic, Rochester, Minnesota, Estados Unidos
[50] University of South Dakota Sanford School of Medicine, South Dakota, Estados Unidos
[51] Liver Unit, Hospital Clinic, Barcelona, España
[52] Universidad de Chile, Santiago, Chile
[53] CUNY Graduate School of Public Health and Health Policy (CUNY SPH), New York, Estados Unidos

Introduction and Objectives: Although the WHO strategy aims to eliminate the hepatitis C virus (HCV) as a public health threat by 2030, national strategies are variable worldwide. This study aimed to assess the establishment of different policies and strategies to eliminate HCV in the Americas.

Materials and Methods: We conducted a 23-item survey about HCV-related policies and strategies among gastroenterologists and hepatologists in the Americas. The survey was carried out electronically (2022–2023). Data were compared with governmental institutions, regulatory agencies, scientific societies, and scientific publications. We estimated an index obtained from a regression scoring method through exploratory analysis, and row values were normalized from 0 to 100.

Results: We obtained 52 responses from 19 countries. The median HCV-related policies index was 51.4 [IQR:27.3–70.1]. The lower establishment of HCV-related policies was observed in Ecuador (0.0), Honduras (6.6), and Costa Rica (9.8), while the highest performance was observed in Argentina (94.1), Colombia (94.7), and Canada (100) (Figure 1A). Fifteen (78.9%) countries have adopted a national strategic plan to eliminate HCV. Three (15.8%) countries have universal screening for HCV infection (Figure 1B). After a positive HCV serological test, 10 (52.6%) countries perform reflex testing to confirm HCV diagnosis using the same sample. However, only 7 (36.8%) countries have an alert system for the requesting physician. Twelve (63.2%) countries have a direct referral system for specialized care of HCV-positive cases. Universal access to direct-acting antivirals (DAAs) exists in 15 (78.9%) countries. Universal access to DAAs was not widely available in Cuba, Ecuador, Venezuela, and the United States. Seven (36.8%) countries have generic DAAs available. Only 3 (15.8%) countries performed a retrospective search for HCV-positive cases that could have been lost to follow-up.

Conclusions: Although most countries have adopted a national strategic plan to eliminate HCV, there are several issues and barriers to elimination in the Americas.



https://doi.org/10.1016/j.aohep.2023.101273