

WORLD AQUACULTURE 22 PROGRAM GRID							
Date/Time	Salon 6	Salon 5A	Salon 5B	Salon 2A	Salon 2B	Salon 1A	Times/Date
Tuesday May 24	12:00 Registration						12:00
	17:00 Welcome, awards & Opening Ceremony - Bienvenidos & Inauguración						17:00
	18:00 Welcome diets, Bebidas de Bienvenida						18:00
W	9:00 Panel 1: FADWAS - Aquaculture's Potential for Economic Growth	Shrimp pathology and biosecurity	INAPESCA 60th Anniversary - Algae Workshop	Nutrition and Feeds-1	Aquaponics, Integrated Systems -1	Hatchery and Nursery	9:00
e	11:00 Plenary 1 - Plenary 1 - Are we so open-minded to seaweed aquaculture that our brains are falling out? Seaweed frontiers and facts and how best to accelerate seaweed aquaculture - Barry Costa Pierce	Exhibition & Refreshment & Posters in Exhibition hall					11:00
n	12:20 Awards for Mexican experts - Somexacua and Inapescas celebrates and invites						12:20
e	13:00 Lunch						13:00
d	14:30 Panel 2: WAS: Offshore Ocean Farming	Special Session USSEC (closed)	INAPESCA 60th Anniversary - Crustaceans Workshop	Nutrition and Feeds-2	Diseases (until 16:30)	Table 1 (sponsored by Ziegler)	14:30
s	16:10 CIDEA/COMPESCA Strategic development of Aquaculture: a vision of tomorrow (1.5 hours)	Special Session USSEC (closed)	Exhibition & Refreshment & Posters in Exhibition hall				16:10
y	16:30 Special Session USSEC (closed)	Marine Invertebrates -1		Nutrition and Feeds-3	Socioeconomics-1	Table 2 (sponsored by Ziegler)	16:30
2	17:30 Happy Hour in Exhibition Hall - Posters in Lobby						17:30
5							
T	9:00 Panel 3: WAS: Women in Aquaculture	Special session: CNI/INAPESCA sharing successful experiences	INAPESCA 60th Anniversary - Bivalve Malakus Workshop	Animal Health and Welfare - 1	Special session: Identification of shrimp culture	Biofloc Systems	9:00
h	11:00 Exhibition & Refreshment & Posters in Exhibition hall						11:00
u	11:40 Plenary 2 - Plenary 2 - Impact of sustainability on responsible Aquaculture, cultivating the land to protect the ocean - Jim Suller (USSEC President)						11:40
r	12:00 Plenary 3 - plenary 3 - Challenges and Opportunities for a Sustainable Aquaculture - Carlos Numan, CIDEA						12:00
s	12:40 Plenary 4 - plenary 4 - The importance of the professional associations for the future of aquaculture - WAS President Antonio Garza de Yta						12:40
a	13:00 Lunch						13:00
M	14:30 Panel 4: WAS: Sustainability and Climate Change	Shrimp Feeding and Nutrition (sponsored by USSEC-1)	INAPESCA 60th Anniversary - Bivalve Malakus Workshop	Animal Health and Welfare - 2	Socioeconomics-2	Special Session AEMA: Aquaculture Nutrition	14:30
a	16:10 Shrimp Feeding and Nutrition (sponsored by USSEC-2)			Animal Health and Welfare - 3			16:10
y	16:30 Special Session USSEC (closed)	Marine Invertebrates - 2			Socioeconomics-3		16:30
2	17:30 Happy Hour in Exhibition Hall - Posters in Lobby						17:30
6							
F	9:00 Panel 5: WAS: Spatial planning, zoning and area management for Aquaculture	Shrimp Feeding and Nutrition (sponsored by USSEC-3)	INAPESCA 60th Anniversary - Marine Fish Workshop	Freshwater Species - 1	Socioeconomics-4	Investors' Forum	9:00
r	11:00 Exhibition & Refreshment & Posters in Exhibition hall						11:00
r	11:20 Panel 6: FADWAS: Resilience of aquaculture to external shocks	Breeding, genetics and Omics-1	INAPESCA 60th Anniversary - Marine Fish Workshop	Freshwater Species - 2	Production Systems - 1	Investors' Forum	11:20
i	12:00 Lunch						12:00
d	13:00 Special session: FAO / AIPAA	Breeding, Genetics and Omics - 2	Marine Invertebrates - 3				13:00
y	14:30 Special session: FAO / AIPAA			Catfish (sponsored by Ziegler)	Production Systems - 2	Investors' Forum	14:30
2	15:30 Exhibition & Refreshment & Posters in Exhibition hall (take down posters)						15:30
5	16:10 Session						16:10
7	16:30 Session						16:30



World Aquaculture 2021

WEDNESDAY, May 25

PANEL 1 FAO/WAS- AQUACULTURE IN TERRITORIAL ECONOMIES

Wednesday, May 25 09:00 - 11:00 Salon 6

- 9.00 Alejandro Flores Nava / Francisco Javier Martínez Cordero (coordinators)**
Welcome and Panel's presentation
- 9.10 Javier Martínez Cordero. CIAD Mazatlán y Red Tilapia México**
Poverty impacts of tilapia aquaculture at small scale in rural households in South Pacific States in Mexico
Francisco
- 9.25 BM María Claudia Merino. AUNAP Colombia**
Alimentación alternativa de bajo costo en la acuicultura del Meta, Colombia: impactos en la competitividad de los AREL.
- 9.40 Felipe Matías. Brasil**
Rural aquaculture in Brazil. Impacts on local economies
- 9.55 Alejandro Flores Nava. FAO- ALC**
Dinamización económico-productiva a partir del fomento acuícola en territorios de AL
- 10.10 Ing. Esteban Ramírez. Gerente General del Instituto Tecnológico del Salmón INTESAL Chile**
Desarrollo económico de los territorios salmoneros de Chile
- 10.25 Ben Belton. Global Lead for Social and Economic Inclusion: The WorldFish. Michigan State University**
Small scale aquaculture and its diversity in Asia
- 10.40 General Discussion and Panel's conclusions**

SHRIMP PATHOLOGY AND BIOSECURITY-1

Wednesday, May 25 09:00 - 11:00 Salon 5A

- 09:00 Nelson Peña Navarro**, Juan Esteban Barquero Chanto, Cesar Marcial Escobedo Bonilla, Karen Oviedo Bolaños, Jorengeth Abad Rodríguez Rodríguez, Rodolfo Umaña Castro, Carolina Sancho Blanco
PREVALENCIA DE LA NECROSIS AGUDA DEL HEPATOPÁNCREAS EN CAMARONERAS DEL GOLFO DE NICOYA Y PACÍFICO CENTRAL DE COSTA RICA
- 09:20 Silvia Ramírez Flores**, Jorengeth Abad Rodríguez Rodríguez, Brandon Chacón Pérez, Alejandra Murillo Ríos, Nelson Peña Navarro
EVALUACIÓN DE LA PATOGENICIDAD DE *Vibrio parahaemolyticus*, CAUSANTE DE AHPND, AISLADOS DE CAMARONERAS DEL GOLFO DE NICOYA EN COSTA RICA
- 09:40 Sonnya Mendoza**, Dayan Munoz Acosta
EFECTIVIDAD DE PROFILÁCTICOS COMERCIALES PARA CONTROLAR *VIBRIO* SPATÓGENOS EN LARVICULTURA DE CAMARÓN EN ECUADOR

HATCHERY AND NURSERY

Wednesday, May 25 09:00 - 11:00 Salon 1A

- 09:00 Martin Oscar Rosales-Velazquez**, Janett Valdez-Olachea, Jose Ortiz-Galindo
EMBRYO QUALITY IN THE VOLUNTARY SPAWNING OF FIRST-GENERATION (F1) BARRED SAND BASS *Paralabrax nebulifer* KEPT IN CAPTIVITY
- 09:20 Martin Rosales-Velazquez**, Irlanda Lopez-Silva, Jose Ortiz-Galindo
EFFECT OF WATER TEMPERATURE ON EMBRYONIC DEVELOPMENT AND HATCHING TIME OF THE BARRED SAND BASS *Paralabrax nebulifer* (PERCIFORMES: SERRANIDAE)
- 09:40 Imelda Soto-Andrade**, José Luis Ortiz Galindo, Martín Oscar Rosales Velázquez
MORPHOLOGICAL DEVELOPMENT IN CULTURED BARRED SAND BASS *Paralabrax nebulifer* LARVAE
- 10:00 Brandon Escárcega Miranda**, Mario A. Galaviz, Ignacio Fernandez-Monzon, Fernando Barreto-Curiel, Lus M. López, Samuel Sánchez-Serrano, Conal D. True
EFFECT OF EARLY CO-FEEDING ON THE PERFORMANCE AND DEVELOPMENT OF DIGESTIVE SYSTEM OF TOTOABA *Totoaba macdonaldi* LARVAE AND JUVENILES
- 10:20 Francois Jegou**, Yoav Rosen, Delphine Weissman, Sarah Cooper
ENHANCES SHRIMP IMMUNITY AND GROWTH
- 10:40 Cátia Marques**, Cátia Lourenço-Marques, Ana C. Mendes, Sara Castanho, Marisa Barata, Sara Sousa e Brito, Mafalda Rocha, Margarida Gamboa, Leticia Luján, Florbela Soares, Laura Ribeiro, Pedro Pousão-Ferreira
THE EFFECT OF REARING TEMPERATURE ON MEAGRE *Argyrosomus regius* GROWTH PERFORMANCE DURING LARVAL AND EARLY JUVENILE STAGES

NUTRITION AND FEEDS

Wednesday, May 25 09:00 - 17:30 Salon 2A

- 09:00 Susana Frias**, Luis Hector Hernandez, Alfonso Alvarez, Madison S. Powell
EFFECT OF DIETARY PROTEIN, LIPID AND CARBOHYDRATE RATIO ON GROWTH, DIGESTIVE AND ANTIOXIDANT ENZYME ACTIVITIES OF FRESHWATER PRAWN *Macrobrachium acanthurus* JUVENILES
- 09:20 Carlos Arturo David Ruales**, Débora Fracalossi, Walter Torres-Vasquez
INFLUENCE OF DIETARY PROTEIN LEVELS ON ZOTECHNICAL PARAMETERS IN LARVAL AND JUVENILE STATES OF *Brycon moorei* (STEINDACHNER 1878), DORADA DEL RIO MAGDALENA, COLOMBIA
- 09:40 Andrea Marchán**, Víctor Vergara, Dania Tello, Isabel Mauricio, Brenda Yance
REQUERIMIENTO DE PROTEÍNA Y ENERGÍA EN GAMITANA *Colossoma macropomum*
- 10:00 Percy Bustmante**, Víctor Vergara, Luis Bazán, Andrea Marchán, Raquel Ccorimanya, Brietner Oncebay
EVALUACIÓN DE TRES PROGRAMAS DE ALIMENTACIÓN SOBRE EL COMPORTAMIENTO PRODUCTIVO DE LA GAMITANA *Colossoma macropomum*
- 10:20 Thiago El Hadi Perez Fabregat**, Fernanda Picoli, Diogo Luis Alcantara Lopes
MIXED CULTURE MICROORGANISMS FERMENTATION AFFECTS SOYBEAN MEAL NUTRITIONAL CHARACTERISTICS AND IMPROVES THE INTESTINAL MORPHOMETRY OF NILE TILAPIA *Oreochromis niloticus* JUVENILES REARED IN BFT SYSTEM RECEIVING PLANT-BASED DIETS
- 10:40 Thiago El Hadi Perez Fabregat**, Nandara Soares de Oliveira, Larissa da Cunha, Luiz Augusto Cipriani, Natalia Ha, Eric Gisbert
FERMENTATION OF SOYBEAN MEAL WITH *Lactobacillus acidophilus* ALLOWS GREATER INCLUSION OF PLANT PROTEIN AND REDUCES *Vibrionacea* BACTERIA IN THE INTESTINE OF SOUTH AMERICAN CATFISH *Rhamdia quelen*
- 11:00 BREAK & LUNCH**
- 14:30 J. Fernando García**, M. Vanessa Oviedo, M. Isabel Nieto, Benito Parra
FISH FEED DEVELOPMENT USING BLACK SOLDIER FLY AND MICROALGAE AS TOTAL FISHMEAL REPLACEMENT FOR TILAPIA CULTURE
- 14:50 Pedro Pousão-Ferreira**, Marisa Barata, Ana Mendes Gamboa, Sara Castanho, Florbela Soares, João Araújo, Narcisa M. Bandarra, Ana Candeias-Mendes, Ana Matias, Cátia Lourenço-Marques
THE PORTUGUESE EXPERIENCE ON SARDINE'S *Sardina pilchardus* AQUACULTURE: ZOTECHNICAL AND NUTRITIONAL ASPECTS
- 15:10 Lorena A. Garnica**, Juan P. Lazo, José A. Mata, Yanet Guerrero
EFFECT OF MACROALGAE AS A FUNCTIONAL INGREDIENT IN GROW-OUT DIETS ON THE BIOLOGICAL PERFORMANCE OF TOTOABA *Totoaba macdonaldi*
- 15:30 Maximilian Sawatzki**, M. Gräfenhahn, J. Wiertz, Carolina Schillinger, Carmen Bader, Valentin Stohl, Inga Huismann
EXTRUSION PROCESSING OF FISH FEED PELLETS: INFLUENCE OF SILICA AND OIL CONTENT ON THE PRODUCT PROPERTIES

- 15:50 Bertha Olivia Arredondo Vega**, Mónica B. Félix-Castro, Regina Elizondo-González, Mario Rojas-Arzaluz, Alberto Peña-Rodríguez, Gracia A. Gómez-Anduro, Alfredo de la Peña, Tania Flores, Karla Trejo, Marisol Jaime, Diana Cunningham, Ismael Sánchez
DIATOMEA *Odontella aurita*, SUPLEMENTO ALIMENTICIO COMO ALTERNATIVA PARA LA PREVENCIÓN DE ENFERMEDADES CARDIOVASCULARES Y OBESIDAD EN LA POBLACIÓN MEXICANA

INAPESCA 60TH ANNIVERSARY. ALGAE WORKSHOP

Wednesday, May 25 09:00 - 11:00 Salon 5B

Algae Workshop

- 9:00-** Bienvenida Ocean. Juan Carlos Lapuente Landero
- 9:10** Jose Zertuche-Gonzalez
COMMERCIAL SEAWEED CULTIVATION IN MEXICO
- 9:10** Desarrollo de cultivo de algas comerciales en México y repoblamiento
Dr. José Antonio Zertuche González
- 9:30** Aplicaciones de la macroalgas en México Dr. Daniel Robledo Ramírez
- 9:50** Esfuerzos en Baja California con sargazos (kelps); primer privado con permiso de fomento Ocean.
Roberto Marcos Ramírez
- 10:10** Algas Marinas, Aplicaciones Biotecnológicas Dr. Enrique Hernández Garibay
- 10:30** Mesa de expertos Preguntas de análisis y opinión Todos

AQUAPONICS, INTEGRATED SYSTEMS

Wednesday, May 25 09:00 - 16:10 Salon 2B

- 09:00 Laura Silva**, Laura Silva, Jesaias I. Costa, Isabela C. de Almeida, Maria Célia Portella
LAMBARI *Astyanax lacustris* AND MUSTARD MICROGREENS *Brassica juncea* PRODUCTION IN SLIGHTLY SALINE AQUAPONIC SYSTEMS
- 09:20 Jesús Josafat De León-Ramírez**, Samuel Lopéz-Tejeida, Leticia Félix-Cuencas, Sergio Alonso Martínez-Ramos, Juan Fernando García-Trejo
FEASIBILITY STUDY OF AN AQUAPONIC POLYCULTURE TILAPIA-CATFISH AND LETTUCE-CHARD
- 09:40 Carlos León Ramos**
BIO-INTEGRATED AQUAPONICS: AN INTENSIVE COMMERCIAL PRODUCTION OF TILAPIA IN AN INTEGRATED AQUAPONICS SYSTEM USING ALTERNATIVE FISH FEED
- 10:00 Carlos León Ramos**
ACUAPONIA COMO SISTEMA AGROTURÍSTICO PARA DAR VALOR A LA PRODUCCIÓN Y A LA EDUCACIÓN/AQUAPONICS AS A AGRO-TOURISTIC INVESTMENT

- 10:20 Alma J. Jiménez Delgadillo**, Carlos Iván Pérez-Rostro, Martha Patricia Hernández-Vergara, Verónica Valadez Rocha
EVALUATION OF AN INTEGRATED MULTITROPHIC AQUACULTURE SYSTEMS (IMTA) FOR CHILI PRODUCTION
- 10:40 Yenitze Elizabeth Fimbres Acedo**, Rodolfo Garza Torres, Francisco Javier Magallón Barajas
DECOUPLED AQUAPONICS SYSTEM USING PHOTOAUTOTROPHIC BIOFLOC

PLENARY 1

Wednesday, May 25 11:40 - 12:20 Salon 6

- 11:40 Barry Costa Pierce**
ARE WE SO OPEN-MINDED TO SEAWEED AQUACULTURE THAT OUR BRAINS ARE FALLING OUT? SEAWEED FANTASIES AND FACTS AND HOW BEST TO ACCELERATE SEAWEED AQUACULTURE

AWARDS FOR MEXICAN EXPERTS

Wednesday, May 25 12:20 - 13:00 Salon 6

PANEL 2 OFFSHORE OCEAN FARMING

Wednesday, May 25 14:30 - 16:10 Salon 6

- 14.30** Welcome and Panel's presentation Louis R. D'Abramo (coordinator)
- 14:40 Barry Antonio Costa-Pierce**, David Fredriksson
ACCELERATING THE DEVELOPMENT OF MARINE AQUACULTURE IN ENERGETIC OCEANS: OFFSHORE INNOVATIONS IN SCALING UP CATAYLZE NEARSHORE INNOVATIONS TO SCALE OUT
- 15:05 Kenneth L. Riley**, Jonathan A. Jossart, Alyssa Randall Taylor, Gretchen E. Bath
SPATIAL PLANNING FORECASTS OPPORTUNITY FOR OFFSHORE AQUACULTURE
- 15:30 Felipe Ramirez**
MAKING OFFSHORE AQUACULTURE VIABLE: ADVANCEMENTS IN SUBMERSIBLE NET PENS
- 15:50** General Discussion and Panel's Conclusions

TILAPIA

Wednesday, May 25 14:30 - 17:30 Salon 1A

- 14:30 Nassrin Mashaii**, Farhad Rajabipour, Mohammad Jafari, Habib Hasan-Zadeh
TILAPIA CULTURE IN TNAK INDOOR SYSTEM
- 14:50 Paola Barato**, July Moreno, Gustavo Bermudez
ANTIMICROBIAL IN VITRO ACTIVITY OF PHYTOEXTRACTS *Allium sativum*, *Origanum vulgare*, *Curcuma longa* AND *Cinnamomum verum* AGAINST *Streptococcus agalactiae* Ib ISOLATED FROM TILAPIA (*Oreochromis* sp.) WITH STREPTOCOCCOSIS
- 15:10 Scott Snyder**, Craig Browdy, Tim Markey
DEVELOPMENT OF IMPROVED COMMERCIAL FEEDS FOR COMMERCIAL NILE TILAPIA (*Oreochromis niloticus*). A LABORATORY STUDY ON BALANCING COST, PERFORMANCE, AND SUSTAINABILITY.
- 15:30 Gustavo Alejandro Rodriguez Montes De Oca**, Jaime Arguello-Guevara, Idalia Osuna-Ruiz, Jesús Aarón Salazar Leyva, María Isaura Bañuelos-Vargas, José Cristóbal Román Reyes
DISMINUCIÓN DE LA EFICIENCIA DE MASCULINIZACIÓN EN CRÍAS TILAPIA DEL NILO *Oreochromis niloticus* CON 17 α -METILTESTOSTERONA EN COMBINACIÓN CON EXTRACTOS ACUOSOS DE LA MACROALGA *Padina durvillae*
- 15:50 Nassrin Mashaii**, Farhad Rajabipour, Mohammad Jafari, Habib Hasan-Zadeh
LIMNOLOGICAL STUDY OF EARTH PONDS OF TILAPIA CULTURE

CIDEEA/ COMEPESCA STRATEGIC DEVELOPMENT OF AQUACULTURE: A VISION FOR TOMORROW

Wednesday, May 25 16:30 - 17:30 Salon 6

Panel “Desarrollo Estratégico de la Acuicultura: Una Visión para Mañana” Presentado por: CIDEEA y COMEPESCA	
Hora	Panelistas
16:30-16:35 (5 m)	Roberto Arosemena (moderador) Socio Fundador y Director General del Centro Internacional de Estudios Estratégicos para la Acuicultura. Bienvenida y presentación de panelistas
16:35 -16:45 (10 m)	Dr. Antonio Garza de Yta. Presidente de la Sociedad Mundial de Acuicultura (WAS) “Situación actual y Perspectivas de la Acuicultura Mundial”.
16:45 -16:55 (10 m)	Licda. Flor Torrijos. Directora de la Autoridad de los Recursos Acuáticos de Panamá (ARAP) “Políticas Públicas Gubernamentales para el Desarrollo de la Acuicultura.”
16:55 -17:05 (10 m)	Yahira Piedrahita. Directora de la Cámara Nacional de Acuicultura de Ecuador “Los Organismos Gremiales como Herramienta de Desarrollo Acuícola.”
17:05 -17:15 (10 m)	Miller Alexander Presidente de la Cámara Nacional de la Industria Pesquera y Acuícola de México. “El Desarrollo Acuícola desde la Perspectiva del Sector Pesquero.”
17:15 -17:25 (10 m)	Citali Gómez Lepe. Presidente del Consejo Mexicano para la Promoción del Consumo de Productos Acuícolas y Pesqueros. “La Importancia de la Promoción al Consumo en el Desarrollo de la Acuicultura.”
17:25 -17:45 (20 m)	Sesión de preguntas
17:45 -17:50 (5 m)	Roberto Arosemena (moderador) Resumen y Conclusiones del Panel

INAPESCA 60TH ANNIVERSARY. CRUSTACEANS WORKSHOP

Wednesday, May 25 14:30 - 16:10 Salon 5B

WEDNESDAY

Crustaceans Workshop

14:30 BIENVENIDA

14:45 LÍNEAS GENÉTICAS

Sajad Nazari, Mahdi Golshan, Saltanat Najjar Lashgari, Mohammad Meysam Salahi Ardakani, Maryam Mirbakhsh, Salman Malekpour Kolbadinejad, Seyed Hossein Moradiyan, Esmail Kazemi, Eisa Falahat Naserabad
META-ANALYSIS OF QUANTITATIVE TRAIT LOCI (QTLs) REVEALS THE GENETIC CONTROL OF GROWTH-RELATED TRAITS IN FARMED RAINBOW TROUT *Onchorhynchus mykiss*

15:00 CULTIVO DE ESPECIES ENDÉMICAS

15:15 DESAFÍOS DE LA ACUACULTURA

15:30 TECNOLOGÍAS DE CULTIVO

15:45 CLAUSURA

SOCIOECONOMICS

Wednesday, May 25 16:30 - 17:30 Salon 2B

16:30 **Jorge Schmidt**

FROM LA PAZ TO MEXICO AND THE WORLD, WITH LOVE, THE KAMPACHI COMPANY: A RIPPLE EFFECT ANALYSIS

16:50 **Nicolás Vite-García**, Saúl Serrano, Ángel Cuevas, Camilo Ruiz

SUSTAINABLE COMMUNITY AQUACULTURE: OYSTER FARMING IN THE MEXICAN SOUTH PACIFIC

17:10 **Patricia Borrego Kim**, Mariel Gullian Klanian, Juan Carlos Seijo

EFFECT OF SIZE HETEROGENEITY OF NILE TILAPIA *Oreochromis niloticus* ON THE OPTIMAL HARVEST TIME: A BIOECONOMICS APPROACH

DISEASES

Wednesday, May 25 14:30 - 16:10 Salon 5A

- 14:30 Teresita Del Carmen Guarneros Martinez**, Roberto Cruz Flores, Jorge Cáceres Martínez, Yanet Guerrero Rentería
GENETIC CHARACTERIZATION AND EPIZOOTIOLOGY OF RICKETTSIALES-LIKE ORGANISM ASSOCIATED WITH TISSUE INCLUSIONS OF THE OYSTER *Crassostrea corteziensis* IN THE STATE OF NAYARIT
- 14:50 Ngarangi Walker**, Justin Tibble, H. Riripeti Reedy, Carmen James, Waata Papali'i-Smith, Te Amohaere Ngata-Aerengamate, Regan Fairlie, Wade Reweti
NGA KAITIAKI O PUREHUA - AN INDIGENOUS MARINE BIOSECURITY PROJECT

MARINE INVERTEBRATES

Wednesday, May 25 16:30 - 17:30 Salon 5B

- 16:30 Fernando Rodríguez**, Piedad Morillo-Velarde, Roberto González-Gómez, César Meiners-Mandujano
EFECTO DE LA TEMPERATURA Y SALINIDAD EN EL DESARROLLO EMBRIONARIO DEL PULPO *Octopus insularis* (LEITE & HAIMOVICI, 2008)
- 16:50 Jessica Torres**, Pedro Gallardo, Guillermina Alcaraz, Carlos Rosas, Karla Kruesi
REFUGE PREFERENCE AND ITS RELATIONSHIP WITH GROWTH AND SURVIVAL RATES OF JUVENILE *Octopus maya* IN CULTURE
- 17:10 Isabel Elizondo de la Fuente**, M.D. García-Parra, J. Jiménez-Hernández, C. Arancibia, E. Gastelum-Martínez, L. Ocampo-García, M.O. Ramírez-Sucre
GELLING TEMPERATURE OF ENDEMIC MAYAN OCTOPUS *Octopus maya* MUSCLE OF THREE LOCATIONS OF YUCATAN

INAPESCA 60TH ANNIVERSARY BIVALVE MOLLUSKS WORKSHOP

Thursday, May 26 09:00 - 16:10 Salon 5B

Mollusks Workshop

09:00	Bienvenida y mecánica de la reunion
09:20	Reproducción y genética
09:45	Desarrollo Tecnológico
10:10	Comercialización
10:35	Sanidad
11:00	BREAK
14:30	Conclusiones
16:20	Cierre

SPECIAL SESSION: CANAINPESCA: SHARING SUCCESSFUL EXPERIENCES

Thursday, May 26 09:00 - 11:00 Salon 5A

Panel: **Compartiendo Experiencias de Éxito**

-Caso atún

Ing. Benito Javier Sarmiento Pérez,
Vicepresidente de Maricultura de la CANAINPESCA

-Caso tilapia

M.N.A Juan José Basto Cabrera
Representante de la Sección de Acuicultura de la Delegación de CANAINPESCA en Yucatán

-Caso moluscos bivalvos: Ostión

Ocean. Sergio Guevara Escamilla
Presidente de la Delegación de CANAINPESCA en Baja California

-Caso camaró

Ocean. Marco Ross Guerrero
Presidente del Colegio de Oceanólogos de Sonora y Consultor para la Asociación de Acuicultores de Sonora.

-Caso trucha

Biol. Manuel Sarmiento Fradera Acuicultor y Socio de Nemi Natura

Moderador: Lic. Roberto Arosemena Villarreal

SPECIAL SESSION: INTENSIFICATION OF SHRIMP CULTURE

Thursday, May 26 09:00 - 11:00 Salon 2B

- 09:20 Lorenzo M. Juarez Mabarak**
ENVIRONMENTAL SUSTAINABILITY AND INTENSIFICATION IN AQUACULTURE: II. EFFICIENCY IS THE NAME OF THE GAME
- 09:40 Lorenzo M. Juarez Mabarak**
SUSTAINABLE INTENSIFICATION OF SHRIMP FARMING: I. GENERAL PRINCIPLES
- 10:00 Humberto Villarreal**, Bernabe Camacho, Jose Naranjo, Mayra Vargas-Mendieta, Alejandra Villarreal-Garcia
BIOECONOMIC ANALYSIS OF THE ANNUAL INTENSIVE PRODUCTION OF PACIFIC WHITE SHRIMP (*Litopenaeus vannamei*) IN BAJA CALIFORNIA SUR, MEXICO
- 10:20 Scott Horton**
SHRIMP FARMING INTENSIFICATION IN GUATEMALA, A CASE STUDY
- 10:40 Humberto Villarreal**, Jose Naranjo-Paramo, Alejandra Villarreal-Garcia, Mayra Vargas-Mendieta
AN EVALUATION OF AERATION EQUIPMENT TYPE AND TIME ON THE ECONOMIC IMPACT OF INTENSIVE PHOTOHETEROTROPHIC SYSTEMS WITHOUT WATER EXCHANGE FOR THE WHITE SHRIMP *L. vannamei*

BIOFLOC SYSTEMS

Thursday, May 26 09:00 - 11:00 Salon 1A

- 09:00 Farhad Rajabipour**, Nassrin Mashai
TILAPIA PRODUCTION IN BIOFLOC SYSTEM
- 09:20 Diana Aguilera-Rivera**, Manuel Valenzuela-Jiménez, Claudia Durruty-Lagunes, Gerard Cuzon, Eduardo Pacheco, Miguel Arévalo, Wilson Wasielesky, Gabriela Rodríguez-Fuentes, Alvaro Barreto, Gabriela Gaxiola
EFFECT OF WATER SALINITY ON THE OXIDATIVE SYSTEM OF JUVENILES OF THE NORTH ATLANTIC WHITE SHRIMP *Litopenaeus setiferus* REARED IN BIOFLOC TECHNOLOGY
- 09:40 Adolfo Jatobá**, Carolina Cristina Alves de Menezes, Norha Bólvivar, Márnio Roveda, Alexandre Gabbi
ORGANIC ACID IN BFT WATER FOR NILE TILAPIA
- 10:00 Diana Aguilera-Rivera**, Alejandra Prieto-Davó, Gabriela Rodríguez-Fuentes, Karla Susana Escalante-Herrera, Gabriela Gaxiola
A VIBRIOSIS OUTBREAK IN THE PACIFIC WHITE SHRIMP *Litopenaeus vannamei* REARED IN BIOFLOC AND CLEAR SEAWATER
- 10:20 Gustavo Alejandro Rodriguez Montes De Oca**, María Isaura Bañuelos-Vargas, Ángel de Jesús Sánchez-Ramírez, Edgar Germán Gómez-Ávila, Emmanuel Martínez-Montaño, José Cristóbal Román Reyes
EFECTOS POSITIVOS DE LA APLICACIÓN CONTINUA DE PROBIÓTICOS COMERCIALES PARA EL MANEJO DE TILAPIA ROJA CULTIVADA EN AGUA DE MAR CON BIOFLOC.
- 10:40 Thiago El Hadi Perez Fabregat**, Kayane Pereira Besen, Larissa da Cunha
BFT SYSTEM IMPROVES GOLDFISH *Carassius auratus* SKIN PIGMENTATION

PANEL DISCUSSION 3: WOMEN IN AQUACULTURE

Thursday, May 26 09:00 - 11:00 Salon 6

- 9:00** Adriana Ferreira Da Silva/ Alejandro Flores Nava
Welcome and Panel's prese
- 9:10** Marisol Izquierdo, ULPGC, Instituto ECOAQUA. Spain
Why do we need more women in European and Asian aquaculture?
- 9:25** María Celia Portella. UNESP Centro de Aquicultura
Brasil The role of women in Brazilian aquaculture: how can we increase their participation?
- 9:40** Maria Teresa Viana. UABC · Instituto de Investigaciones Oceanológicas. México
Women in Mexican aquaculture, their significance in research and technological development
- 9:55** Doris Soto. Centro INCAR, Chile
Women in aquaculture in Chile: main challenges to increase their participation
- 10:10** General Discussion and Panel's conclusions
Panel members and Public

ANIMAL HEALTH & WELFARE

Thursday, May 26 09:00 - 17:30 Salon 2A

- 09:00** **Ana G. Trasviña Moreno**, Sergio Maciel, Alejandro Ysla
ECTOPARASITES IN *Seriola rivoliana* PRODUCTION IN THE GULF OF CALIFORNIA: CHALLENGES AND AREAS OF OPPORTUNITY
- 09:20** **Irma Gallegos Morales**, Fernando Iriarte Rodríguez, Martha Perera García
ESTUDIO HEMATOLOGICO DE *Petenia splendida* (GUNTER, 1862) CÍCLIDO NATIVO DE IMPORTANCIA COMERCIAL EN EL ESTADO DE TABASCO, MÉXICO
- 09:40** **Marina Rubio-Benito**, Nicholas Romano, Kenneth Overturf, Vikas Kumar
MITIGATION OF SOYBEAN MEAL-INDUCED ENTERITIS IN RAINBOW TROUT *Oncorhynchus mykiss* USING BILE SALT DIETARY SUPPLEMENTATION
- 10:00** **Ignacio López**, Ewa Sujka, Antonio Martínez, Álvaro Rodríguez, Femi John Fawolle
USE OF IMMUNOMODULATORS FOR THE CONTROL OF THE IMMUNE AND INFLAMMATORY REPSONSE IN FISH FARMING
- 10:20** **John Van Wingerden**, Doug Kelley
TILAPIA LOVE MILK OF MAGNESIA: STRONG, GENTLE SUPPLEMENT FOR CLOSED-LOOP AQUACULTURE SYSTEMS
- 10:40** **Lenin Rangel López**, Adrian Zaragoza Bastida, Nallely Rivero Pérez
ACCIÓN ANTIBACTERIANA DEL EXTRACTO HIDROALCOHOLICO DE *Salix babylonica* SOBRE BACTERIAS QUE AFECTAN LA PRODUCCION ACUICOLA DE TRUCHA ARCOÍRIS *Oncorhynchus mykiss* Y TILAPIA *Oreochromis* sp.
- 11:00** **BREAK & LUNCH**

- 14:30 Cristina Pascual**, Jaime Suárez, Pedro Gallardo, Ariadna Sánchez, Honorio Cruz, Adolfo Sánchez
COMPARATIVE STUDY OF ANALYTIC TECHNIQUES IN BLOOD SAMPLES OF COMMON SNOOK
Centropomus undecimalis
- 14:50 Ana Venegas**, Gabriel Pantoja-Nuñez, Jose Chavez P., Jose Luevano A., M. Acuña-Yanes
EVALUACIÓN *IN VITRO* DE LA RESIDUALIDAD Y EFECTO DESINFECTANTE CON DIFERENTES
CONCENTRACIONES DE UN PRODUCTO CUATERNARIO DE AMONIO-GLUTARALDEHÍDO
(PECDESINA® 4G) EN AGUA MARINA
- 15:10 Ana Venegas**, Jose Chavez P., Gabriel Pantoja-Nuñez, Jose Luevano A., M. Acuña-Yanes
EVALUATION OF THE SANITIZING EFFECTIVENESS OF A COMMERCIAL QUATERNARY
AMMONIUM-GLUTARALDEHYDE (PECDESIN® 4G) APPLIED TO SHRIMP'S POND WATER BY
ADOPTING AN ATTRIBUTE SAMPLING
- 15:30 Ngarangi Walker**, Justin Tibble, H. Riripeti Reedy, Regan Fairlie, Wade Reweti,
Te Amohaere Ngata-Aerengamate
SUSTAINABLE DEVELOPMENT OF AQUACULTURE THAT SUPPORTS INDIGENOUS FOOD
SECURITY, SOVEREIGNTY AND SUSTAINABILITY.
- 15:50 Sonnya Patricia**, Natalia Gonzalez, Sergio Giraldo
EFECTO DEL HONGO *Ganoderma lucidum* SOBRE LA SALUD DEL CAMARÓN *Litopenaeus*
vannamei CULTIVADO EN ECUADOR
- 16:10 BREAK**
- 16:30 Andres Henao**, Dagfinn Strømme, Terje Tingbø, Hanne Andersen
PRACTICAL CHALLENGES WHEN INJECTING MILLIONS OF FISH WITH VACCINES
- 16:50 Andrés Henao**, Claudia Maira, Terje Tingbø
THE ROLE OF PREVENTATIVE FISH HEALTH MANAGEMENT IN SUSTAINABLE AQUACULTURE
PRODUCTION
- 17:10 Andres Piedrahita**
RESULTS OF A COMMERCIAL VACCINATION PROGRAM BY INJECTION USING AN
AUTOGENOUS VACCINE FOR *Streptococcus agalactiae* biotype 1a IN A TILAPIA CAGE FARM
OPERATION IN HAITI

PLENARY 2

Thursday, May 26 11:40 - 12:00 Salon 6

- 11:40 Jim Sutter**
IMPACT OF SUSTAINABILITY ON RESPONSIBLE AQUACULTURE, CULTIVATING THE LAND TO
PROTECT THE OCEAN

PLENARY 3

Thursday, May 26 12:00 - 12:40 Salon 6

- 12:00 Carlos Wurmman**
CHALLENGES AND OPPORTUNITIES FOR A SUSTAINABLE AQUACULTURE

PLENARY 4

Thursday, May 26 12:40 - 13:00 Salon 6

- 12:40 Antonio Garza de Yta**
THE IMPORTANCE OF THE PROFESSIONAL ASSOCIATIONS FOR THE FUTURE OF
AQUACULTURE

PANEL 4: SUSTAINABILITY AND CLIMATE CHANGE

Thursday, May 26 14:30 - 16:10 Salon 6

- 14:45 Gregor K. Reid**
RECONCILING CLIMATE CHANGE AND AQUACULTURE
- 15:05 Doris Soto**, Marcelo Fuentes, Carlos Molinet, Jorge Leon-Munoz
BETTER PLANNING AND MANAGEMENT OF AQUACULTURE AS FIRST STEPS TOWARDS
CLIMATE CHANGE ADAPTATION
- 15:30 José Aguilar-Manjarrez**
LESSONS FROM CHILE'S ARTISANAL FISHERS AND SMALL-SCALE AQUACULTURE FARMERS
AS THEY CONFRONT CLIMATE CHANGE

SHRIMP FEEDING AND NUTRITION

Thursday, May 26 14:30 - 17:30 Salon 5A

- 14:30 Jose Troncoso**, Jesus Venero, Fernando Carofilis, Roberto Bravo, Jose Mario Vargas,
Oswaldo Anaya
FUNCTIONAL GROWER SHRIMP FEED IN ECUADOR AND MEXICO INCREASED SURVIVAL IN
Litopenaeus vannamei DURING 2020 – 2021
- 14:50 Allen Davis**, Sam Walsh, Leila Strebek, Khanh Nguyen, Melanie Rhodes, Silvio Peixoto
FEED EFFECTORS IN SOY OPTIMIZED DIETS: PASSIVE ACOUSTICS FROM THE LABORATORY
TO THE POND
- 15:10 Pierrick Kersanté**, Guillaume Le Reste, Benoit Diringier, Juan Quimi, Renaud Sergheraert,
Joël Duperray
FREE AMINO-ACIDS MIX MADE OF POULTRY KERATIN IMPROVES SURVIVAL OF WHITELEG
SHRIMP POST LARVAE *Litopenaeus vannamei* CHALLENGED WITH ACUTE HEPATOPANCREATIC
NECROSIS DISEASE AND WHITE SPOT SYNDROME VIRUS
- 15:30 Oscar V. Vazquez**, Ramón Casillas-Hernández, José R. González-Galaviz, Juan C. Gil-Núñez,
Victor D. Naranjo, Javier Macedo, Roberto Santiago, Karthik Masagounder
EFFECT OF METHIONINE SOURCES AND *Bacillus amyloliquefaciens* CECT 5940 ON GROWTH
PERFORMANCE OF SHRIMP FED REDUCED FISHMEAL DIETS
- 15:50 Felipe do Nascimento Vieira**, Ariane Guimarães, Cristhiane Guertler, Gabriella Pereira,
Jaqueline Coelho, Priscila Rezende, Walter Seiffert
Nannochloropsis sp. AS FEED ADDITIVE FOR THE PACIFIC WHITE SHRIMP: EFFECT ON MIDGUT
MICROBIOLOGY, THERMAL SHOCK RESISTANCE AND IMMUNOLOGY

16:10 **BREAK**

16:30 **Gabriela Gaxiola**, Eden Magaña-Gallegos, Miguel Arevalo, Gerard Cuzon
DOES UNILATERAL EYESTALK ABLATION AND CULTURE SYSTEM ORIGIN AFFECT PENAEID SHRIMP REPRODUCTIVE PERFORMANCE AND PROGENY QUALITY?

16:50 **Gabriela Gaxiola**, Sara Ortiz-Guillen, Eden Magaña-Gallegos, Miguel Arevalo, Gerard Cuzon
PARTIAL SUBSTITUTION OF FROZEN-FRESH FOOD BY AN EXPERIMENTAL DIET IN *Litopenaeus vannamei* (BOONE, 1931) (DECAPODA: DENDROBRANCHIATA: PENAEIDAE) BROODSTOCK

17:10 **François Jégou**, Sarah Cooper, Yoav Rosen, Delphine Weissman
Pichia guilliermondii ENHANCES SHRIMP IMMUNITY AND GROWTH

SPECIAL SESSION: AENA: AQUACULTURE NUTRITION

Thursday, May 26 14:30 - 16:10 Salon 1A

14:30 **Maria Teresa Viana**, Andrea Manriquez-Patiño, Arleta K. Skrzynska, Aurora Tinajero
EVALUATION OF CALIFORNIA YELLOWTAIL *Seriola dorsalis* FED PRACTICAL DIETS FROM PARTIAL TO TOTAL FISH OIL AND FISH MEAL REPLACEMENT

14:50 **Crisantema Hernández**, Cynthia Esmeralda Lizárraga Velázquez, Erika Yazmin Sánchez Gutiérrez
DESARROLLO DE ALIMENTOS FUNCIONALES PARA ACUACULTURA

15:10 **Martha Patricia Hernández-Vergara**, Diana Pérez de Jesús, Carlos I. Pérez-Rostro, Carlos A. Frías-Quintana
EFFECT OF FOOD RESTRICTION/REFEEDING ON THE SURVIVAL, GROWTH AND DIGESTIVE ENZYMIC ACTIVITY IN HEPATOPANCREAS AND INTESTINE OF MALAYSIAN PRAWN POSTLARVAE CULTURE IN BIOFLOC

15:30 **Gabriela Gaxiola**, Martin Arenas, Alvaro Barreto, Juan Carlos Maldonado
FUNDAMENTAL CRITERIA FOR THE SELECTION OF INGREDIENTS FOR FEED FORMULATION

SOCIOECONOMICS - CON'T

Thursday, May 26 14:30 - 17:30 Salon 2B

14:30 **Daniel Peñalosa Martinell**, Francisco Vergara-Solana, Marcelo E. Araneda, Miguel A. Vela Magaña
BUILDING CONFIDENCE IN INNOVATION: A NOVEL APPROACH TO VALUATING NEW TECHNOLOGIES IN AQUACULTURE

14:50 **C.R. Subhashini**
BACTERIOPHAGE BASED CONTROL OF VIBRIOSIS IN AQUACULTURE

15:10 **Delano Dias Schleder**, Luca Frondana, Mayara Pavan, Dgeofrei Fazzani
CHARACTERIZATION OF BACTERIAL MICROBIOTA ASSOCIATED WITH HISTAMINE-CONTAMINATED SARDINES USING NEXT GENERATION SEQUENCING (NGS)

15:30 **Eduardo Alfredo Mendoza Quintero Mármol**
BREEDING AND CULTURE OF MEXICAN FRESHWATER NATIVE ESPECIES: A GROWING OPPORTUNITY

- 15:50 Carlos Rosas**, Claudia Caamal-Monsreal, Pedro Gallardo, Cristina Pascual, Maite Mascaró, Arely Paredes, Laura Vidal, Diana DeYta, Marco A. Ponce Marquez, Adolfo Sánchez, Gemma L. Martínez Moreno, Gabriela Gaxiola, Manuel Valenzuela, Claudia Durruty, Carlos Maldonado, Miguel Olvera-Novoa, Víctor Vidal Martínez, Dalila Aldana, Martha R. Eriqúez-Díaz, Mariel Gullian-Klanjan, Miguel Vela Magaña, Javier Arana Nah, María L. Isla, Juan J. Sandoval-Gio, Ma. de Los Angeles Sánchez, Manuel O. Ramírez Sucre, Ruby A. Valdez Ojeda, Gaspar Poot López
LA ACUACULTURA EN YUCATÁN: UNA PROPUESTA QUE ARTICULA A LOS SECTORES SOCIALES, ACADEMICOS Y GUBERNAMENTALES
- 16:10 Yenitze Elizabeth Fimbres Acedo**, Rodolfo Garza Torres, Andressa Telles, Gabriel Carrera Alvarado, Alfonso N. Maeda Martínez
COUPLING TECHNOLOGIES IN TILAPIA FARMING AT CIBNOR'S NAYARIT UNIT

MARINE INVERTEBRATES - CONTINUED

Thursday, May 26 16:30 - 17:30 Salon 5B

- 16:30 Luis Felaco**, Arlenie Rogers, Miguel A. Olvera - Novoa
SEA CUCUMBER AQUACULTURE IN LATIN AMERICA AND CARIBBEAN (LAC), PROBLEMS, PROSPECTS, AND FUTURE
- 16:50 Enrique González-Durán**, Álvaro Hernández-Flores, Maren D. Headley, José Duarte-Canul
PHYSIOLOGICAL AND IMMUNOLOGICAL RESPONSE OF SEA CUCUMBERS: THE EFFECTS OF TEMPERATURE AND pH
- 17:10 Jorge Cáceres-Martínez**, Roberto Cruz-Flores, Edna Naranjo, Rebeca Vásquez-Yeomans
FIRST RECORD OF THE INVASIVE CLAM *Corbicula fluminea* IN ENSENADA, BAJA CALIFORNIA, COULD BE A CANDIDATE FOR AQUACULTURE?

FRIDAY, May 27

FRIDAY

PANEL 5: SPATIAL PLANNING, ZONING AND AREA MANAGEMENT FOR AQUACULTURE

Friday, May 27 09:00 - 11:00 Salon 6

- 9.00** Jose Aguilar Manjarrez / Ricardo Haroun
Welcome and Panel's presentation
- 9.10** Jose Aguilar Manjarrez
Spatial technologies for disaster risk management in aquaculture
- 9.25** Ricardo Haroun
Marine Spatial Planning: Insights into the good environmental state of marine waters and msp processes in the Macaronesian sea basin
- 9.40** Antonio Campos
Carrying capacity and zonation in Mexico: working together to develop a better public policy in the aquaculture sector
- 9.55** Giovanna Marino
Aquacultur zoning, site selection and area management. Italian Aquaculture, a practical example.
- 10.10** Yucel Gier
Offshore Mariculture
General Discussion and Panel's conclusions

INAPESCA 60TH ANNIVERSARY MARINE FISH WORKSHOP

Friday, May 27 09:00 - 13:00 Salon 5B

Marine Fish Workshop

- 09:00 Bienvenida y mecánica de la reunion
09:20 Resumen de grupo de trabajo 2021
09:40 Mesa reproducción
10:20 Mesa nutrición
11:00 Receso
11:20 Mesa engorda-comercialización
12:00 Mesa sanidad
12:40 Clausura

SOCIOECONOMICS - CON'T

Friday, May 27 09:00 - 11:00 Salon 2B

- 09:00 Francisco Javier Martinez-Cordero**, Edgar Sanchez-Zazueta, Cristina Taddei Bringas
POVERTY IMPACTS OF TILAPIA AQUACULTURE AT SMALL SCALE IN RURAL HOUSEHOLDS IN SOUTH PACIFIC STATES IN MEXICO
- 09:20 Juan L. Silva**, Gabriela Hidalgo, Shecoya White, Angelica Abdallah-Ruiz, Meredith Maynard, Lauryn Heidelberg
IS *ESCHERICIA COLI* A GOOD INDICATOR OF POSSIBLE FECAL CONTAMINATION OF CATFISH FILLETS?
- 09:40 Daniel Gordillo**, Emily McGregor, Cameron MacLean
SOCIAL CHALLENGES AND RESISTANCE TO CHANGE OF COMMUNITY MEMBERS IN THE NORTHERN ZONE OF CHIAPAS AND HOW THE INDUSTRY (AQUACULTURE) HAS DEVELOPED THE LOCAL ECONOMY
- 10:00 Jorge Alberto Mares Mayagoitia**, Fabiola Lafarga de la Cruz, Juan Antonio de Anda Montañez, Pedro Cruz Hernández, Fiorenza Micheli, Fausto Valenzuela Quiñonez
SEASCAPE GENOMICS OF PINK ABALONE *Haliotis corrugata* AND BINATIONAL MANAGEMENT IMPLICATIONS.
- 10:20 David Cline**
CREATING BETTER EDUCATIONAL VIDEOS FOR EXTENSION AND OUTREACH
- 10:40 Wade Reweti**, Ngarangi K Walker, Dr Savern Reweti, Riripeti Reedy, Justin Tibble, Regan P Fairlie, Te Amohaere Ngata-Aerengamate
AN INDIGENOUS MAORI PERSPECTIVE FROM AOTEAROA NEW ZEALAND ON INFORMATION TECHNOLOGY

SHRIMP FEEDING AND NUTRITION - CON'T

Friday, May 27 09:00 - 11:00 Salon 5A

- 09:00 Griselda Karina González Félix**, Hervey Rodriguez Gonzalez, Manuel Garcia Ulloa Gómez, Silvia Luna Suárez, Sergio Medina Godoy, Pindaro Alvarez Ruiz
USO DE CONCENTRADOS PROTEICOS DERIVADOS DE GRANOS DE DESCARTE PARA LA INCLUSIÓN DIETETICA EN CAMARÓN BLANCO DEL PACÍFICO *Penaeus vannamei*
- 09:20 Kurt Servin Arce**, José Paez Manrique, Simon David, Claudia Figueiredo-Silva
BENEFITS OF ADJUSTING TRACE MINERAL PREMIX IN SHRIMP FEED – A MEXICAN FIELD STUDY
- 09:40 Gabriela Gaxiola**, Alvaro Barreto, Martin Arenas
EFFECT OF LOW AND HIGH SALINITY ON *IN VITRO* AND *IN VIVO* PROTEIN DIGESTIBILITY, GROWTH PERFORMANCE, FEED UTILIZATION AND SURVIVAL OF PRACTICAL FEED INGREDIENTS FOR WHITELEG SHRIMP *Litopenaeus vannamei* JUVENILES

- 10:00 Héctor Paul Reyes Pool**, Ana Sofia Vega Carranza, Ruth Escamilla Montes, Antonio Luna González, Genaro Diarte Plata
ALGINATE MICROCAPSULES AS DELIVERY AND PROTECTIVE SYSTEMS OF *Bacillus licheniformis* IN A SIMULATED SHRIMP'S DIGESTIVE TRACT
- 10:20 Jose Alberto Gutiérrez Vera**, Carmen Guadalupe Paniagua Chavez, Elizabeth Ponce Rivas, Andre Luiz Braga de Souza, Jorge Alfaro Montoya, Misael Rosales Leija
EFFECT OF *Litopenaeus vannamei* CONTACT FEMALE SEX PHEROMONES ON MALE COURTSHIP BEHAVIOR
- 10:40 Jared Antonio Hernández Solís**, José Manuel Romero Orta, Alberto Assiain Hoyos, Juan Lorenzo Reta Mendiola, Erika Iolany Camacho Chuy
ECLOSIONADOR AUTOMÁTICO DE ARTEMIA SALINA PARA ALIMENTACIÓN DE LARVA DE LANGOSTINO MALAYO (*Macrobrachium rosenbergii*)

FRESHWATER SPECIES

Friday, May 27 09:00 - 13:00 Salon 2A

- 09:00 Ana María Carolina Quintero Pardo**, Henry Omar Meneses Martínez, Jhoan Jair David Valle, Luis Gabriel Quintero Pinto, Dagoberto Martínez González
IDENTIFICAÇÃO DE INDIVÍDUOS DE PIRAPITINGA *Piaractus brachipomus* SEM ESPINHAS INTRAMUSCULARES (SEIM) NA REGIÃO SUDESTE DA COLÔMBIA
- 09:20 Maritza L. Soberanes Yepiz**, Karla Sánchez-Villaseñor, Alejandra Cisneros-Geraldo, Juan Carlos Pérez-Rodríguez, Edilmar Cortés-Jacinto
IMPACTO DEL SER HUMANO EN EL LANGOSTINO DE RÍO *Macrobrachium americanum* EN LAS POBLACIONES SILVESTRES DE SAN PEDRO DE LA PRESA (BCS) Y AGUAS BLANCAS (GRO)
- 09:40 Diego Esteban Platas Rosado**, Luis Gózales Reynoso, Abimael Lagunes, Fabiola Beltrán Leyva
PROSPECTIVE OF PANGASIUS PRODUCTION IN SOUTHWEST MEXICO
- 10:00 Jorge Ignacio Peláez Pier**, José Rafael Reyes Campos
AVANCE EN EL CULTIVO DE LANGOSTINO MALAYO *Macrobrachium rosenbergii* EN QUINTANA ROO MEXICO
- 10:20 Karla Teresa González Figueroa**, Juan Lorenzo Reta Mendiola, Alberto Asiain Hoyos, Verónica Lango Reynoso, Felipe Gallardo López, Katia Angélica Figueroa Rodríguez
ESTADO GLOBAL DE LA CADENA PRODUCTIVA DE *Macrobrachium rosenbergii*: UNA REVISIÓN
- 10:40 Roberto Cruz-Flores**, Mónica Hernández-Rodríguez, Jesús Salvador Guirado Flores, Arun K Dhar
USING FORMALIN-FIXED PARAFFIN-EMBEDDED TISSUES AS A SOURCE OF NUCLEIC ACIDS FOR MICROBIOME ANALYSIS IN RAINBOW TROUT *Oncorhynchus mykiss*
- 11:00 BREAK**
- 11:20 Edilmar Cortes-Jacinto**, Marcelo García-Guerrero, Laura Lopez Greco, Luis H Hernandez
AVANCES Y CONTRIBUCIONES PARA LA CONSERVACIÓN DE LANGOSTINOS DEL GENERO *Macrobrachium* EN MEXICO

- 11:40 Miriam V. Martín-Manzo**, Edilmar Cortés-Jacinto, Rosa M. Morelos-Castro, Adrián Munguía-Vega, Maritza L. Soberanes-Yepiz
TRANSCRIPTOME ANALYSIS AND DIFFERENTIAL EXPRESSION OF REPRODUCTIVE TRACT TISSUES OF MALE RIVER PRAWN *Macrobrachium americanum*
- 12:00 María A. Cisneros Geraldo**, Miriam V. Martín Manzo, Edilmar Cortes Jacinto, Rosa M. Morelos Castro, Adrián Munguía Vega, Manuel A. Vargas Ceballos
EVALUACIÓN DE GENES CONSTITUTIVOS Y REPRODUCTIVOS PARA RT-PCR CUANTITATIVA EN *Macrobrachium americanum*.

FORO DE INVERSION FORUM INVESTORS

Friday, May 27 09:00 - 17:30 Salon 1A

- 09:15 Jorge Reyes**
AQUACULTURE AND FISHERIES FINANCE IN MEXICO. EXPERIENCES, PROJECTIONS AND PROPOSALS TO FINANCE AQUACULTURE
- 09:45 Alfonso N. Maeda-Martínez**
EFFICIENT MICROALGAE PRODUCTION SYSTEM
- 10:10 Carlos Rosas**, Daniel Méndez, Antonio Cob, Adriano Cob, Geni Huicab, Juana de la Cruz Ek, Julio Sierra, Silvia Canul, Abgel Yunes
Octopus maya AQUACULTURE: LOOKING FOR PRODUCTS FOR THE GOURMET MARKET
- 10:35 Horacio Javier Martínez Rivera**
GRANJA HÍPER INTENSIVA DE CAMARÓN EN TAMAULIPAS, MÉXICO
- 11:00 Miguel Vela**
REFERENCE POINTS FOR COMMERCIAL GROW OUT FOR RED DRUM (*S. ocellatus*) IN YUCATAN, MEXICO
- 11:25 Humberto Villarreal**, Bernabé Camacho
HYPER INTENSIVE ZERO-WATER EXCHANGE CULTURE OF WHITE SHRIMP *L. vannamei*.
- 11:50 Jorge Pelaez**
FRESHWATER PRAWN, *Macrobrachium rosenbergii* CULTURE IN QUINTANA ROO, MEXICO
- 12:15 Armando Ruiz**
PRODUCTION AND COMMERCIALIZATION OF JAPANESE OYSTERS IN BAJA CALIFORNIA SUR FOR THE NATIONAL AND EXPORT MARKET
- 12:40 Eduardo Alfredo Mendoza Quintero Mármol**
INTENSIFYING SUSTAINABLE TILAPIA AND NATIVE SPECIES PRODUCTION IN SOUTHEAST MEXICO
- 13:00 LINCH**
- 14:30 Juan Carlos Perez-Urbiola**
A TECHNOLOGY FOR THE CULTURE OF AMBERJACK, *Seriola rivoliana*, IN MEXICO

- 14:55 Bertha Arredondo**, Monica Felix-Castro, Regina Elizondo, Mario Rojas, Alberto Peña, Gracia Gomez, Alfredo de la Peña, Tania Flores, Karla Trejo, Marisol Jaime, Diana Cunningham, Ismael Sanchez
DIATOM *Odontella aurita*, AN ALTERNATIVE FOOD SUPPLEMENT FOR THE PREVENTION OF CARDIOVASCULAR DISEASES AND OBESITY IN THE MEXICAN POPULATION
- 15:20 Ricardo Perez-Enriquez**
GENETIC CHARACTERIZATION OF AQUACULTURE POPULATIONS
- 15:45 Humberto Villarreal**, José Naranjo, Mayra Vargas-Mendieta, Alejandra Villarreal-Garcia
A SUSTAINABLE ZERO-WATER-EXCHANGE, FULL-WATER-REUTILIZATION SYSTEM FOR THE INTENSIVE CULTURE OF FRESHWATER REDCLAW GRAYFISH, *Cherax quadricarinatus*
- 16:10 Ana Maria Ibarra**, Jpse Luis Ramírez, Carolina Sánchez, Ismael Sánchez, Karla Trejo
ADVANTAGES OF THE IMPLEMENTATION OF GENETIC TECHNOLOGIES FORT HE PRODUCTION IMPROVEMENT OF JAPANESE OYSTER *Crassostrea gigas* CULTURE
- 16:35 Jorge Lango**
INTENSIVE PRODUCTION SYSTEM FOR PACIFIC WHITE SHRIMP, *L. vannamei*
- 17:00 Jorge Schmidt**
FROM ZERO TO ONE THOUSAND PLUS

PRODUCTION SYSTEMS

Friday, May 27 11:20 - 16:30 Salon 2B

- 11:20 Apolinar Santamaria-Miranda**, Leonardo Ibarra-Castro, Giovanni M. Giacobbe Baldini, Apún-Molina Juan Pablo
PHYSICO-CHEMICAL AND METABOLIC VARIABLES OF WHITE SNOOK *Centropomus viridis*, CULTURE IN FLOATING CAGES IN NORTHWESTERN MEXICO
- 11:40 Yahira Piedrahita**
PRINCIPLES AND PRACTICES OF SHRIMP FARMING IN ECUADOR AND WAY FORWARD
- 12:00 Lorena M. Sosa Basto**, Miguel A. Olvera Novoa
LA ACUACULTURA INTEGRADA MULTITRÓFICA COMO ESTRATEGIA PARA EL CULTIVO EN TANQUES DE PARGO CANANÉ *Ocyurus chrysurus*, EXPERIENCIAS PRELIMINARES
- 12:20 Adriana Artilles**, Melissa Allen, Jason Stannard, Richard Towner, Klara Verbyla, Jorge Cordova, Joao Rocha, John Buchanan
MICROBIOLOGICAL DIVERSITY AND COMPOSITION OF WATER AND SEDIMENTS IN THREE FARMS FROM ECUADOR
- 12:40 Jorge Ignacio Peláez Pier**, José Rafael Reyes Campos, Osvaldo de León Moncibaiz
EVALUACION DEL SISTEMA DE PRODUCCION IN POND RACEWAYS EN UN PERIODO DE 3 AÑOS CON TILAPIA *Oreochromis niloticus*
- 13:00 LINCH**

- 14:30 Jose Luis Arzabala Molina**, Rosa Leon Medina, Lucia Soto Simental, Luis Enrique Espinoza Buitimea, Urbano Gonzalez Gazga
EFFECTIVENESS OF AN RECIRCULATION AQUACULTURE SYSTEM (RAS) IN THE QUARANTINE AND MATURATION OF WHITE SHRIMP BROODSTOCK *Litopenaeus vannamei*
- 14:50 Carlos León Ramos**
PROYECTO CERO: SISTEMA HIBRIDO DE PRODUCCIÓN DE TILAPIA/ROBALO CON CAMARON EN SISTEMA DE RECIRCULACION DESACOPLADO CON ACUAPONO
- 15:10 Leticia Felix-Cuencas**, Juan Fernando Garcia-Trejo, Samuel Lopez-Tejeda, Jesus Josafat De Leon-Ramirez, Claudia Gutierrez-Antonio
EFFECT OF TEMPERATURE AND CULTURE DENSITY ON THE GROWTH AND NUTRITIONAL IN TILAPIA *Oreochromis niloticus* IN RAS
- 16:10 BREAK**
- 16:30 Esau Arana**
IN-POND RACEWAYS SYSTEM, (IPRS) EXPERIENCES IN LATAM
- 16:50 Loretta Roberson**, David Bailey, Clifford A. Goudey, Gretchen S. Grebe, Hauke Kite-Powell, Scott Lindell, Domenic Manganelli, Michael Marty-Rivera, Crystal Ng, Charles Yarish
RESEARCH AND DEVELOPMENT OF TROPICAL SEAWEED AQUACULTURE TECHNIQUES AND BEST MANAGEMENT PRACTICES ACROSS MULTIPLE SITES IN THE CARIBBEAN
- 17:10 Gretchen Grebe**, Dr. Carrie J. Byron, Damian C. Brady, Adam S. St. Gelais, Barry A. Costa-Pierce
THE EFFECT OF DISTAL-END TRIMMING ON *Saccharina latissima* MORPHOLOGY, COMPOSITION, AND PRODUCTIVITY

BREEDING AND GENETICS

Friday, May 27 11:20 - 16:10 Salon 5A

- 11:20 Adriana Artilles**, E Hu, Melissa Allen, Anu Frank-Lawale, Richard Towner, Salvador Gezan, John Buchanan
GENETIC OVERVIEW TO REVEAL HOW THE CAPTIVE POPULATION WAS, IS, AND SHOULD BE MANAGED
- 11:40 Majidreza Khoshkholgh**, Sajad Nazari
DE NOVO ASSEMBLY AND ANNOTATION OF THE TRANSCRIPTOME OF THE NARROW-CLAWED CRAYFISH *Pontastacus leptodactylus* FROM THE CASPIAN SEA
- 12:00 María de Jesús Contreras-García**, Wilfrido Miguel Contreras-Sánchez, Alejandro Mcdonal-Vera, Leonardo Cruz-Rosado, Manuel Mendoza-Carranza
FEMINIZACION DEL ROBALO *Centropomus undecimalis* MEDIANTE IMPLANTES DE ESTRADIOL
- 12:20 Ignacio Fernandez**, Fátima de Vicente, Francisco J. Toledo-Solís, Jorge M.O. Fernandes, Ana M. Larrán
CIRCULATING ncRNAs IN BLOOD PLASMA FROM RAINBOW TROUT *Oncorhynchus mykiss*: INTEGRATIVE BIOMARKERS IN FISH NUTRITION
- 13:00 LINCH**

- 14:30 Galilea Fonseca González**, Carmen G. Paniagua-Chávez, Marisela Aguilar-Juárez
CRYOPRESERVATION OF GONADAL TISSUE OF WHITE SNOOK *Centropomus viridis*
- 14:50 Sajad Nazari**, Mahdi Golshan, Saltanat Najjar Lashgari, Seyed Amin Mortazavi, Mohammad Meysam Salahi Ardakani, Seyed Hossein Moradian
APPLICATIONS OF BIOINFORMATIC TOOLS FOR GENE REGULATORY NETWORKS INVOLVED IN SEXUAL MATURATION OF RAINBOW TROUT *Onchorhynchus mykiss*
- 15:10 Miguel Angel del Rio Portilla**, Miguel Á. Del Rio-Portilla, Fabiola Lafarga-De la Cruz, Irene de los Á. Barriga-Sosa, Francisco J. García-De León, Clara E. Galindo-Sánchez, Carmen Paniagua-Chávez
THE MEXICAN AQUATIC GENETIC RESOURCE NETWORK: WHERE DOES IT STAND AND WHERE IS IT GOING?

PANEL 6 FAO/WAS: RESILIENCE OF AQUACULTURE TO EXTERNAL SHOCKS

Friday, May 27 11:20 - 13:00 Salon 6

- 11.20 Alejandro Flores Nava / Francisco Javier Martínez Cordero**
Welcome and Panel's presentation
- 11.30 Mario González R**
Fenómenos migratorios y efectos en la acuicultura
- 11.45 Adolfo Alvial**. Club de Innovación Acuícola. Chile
ASSOCIATIVITY TO INNOVATE IN AQUACULTURE'S PRESENT AND FUTURE CHALLENGES. THE CHILE CASE
- 12.00 Francisco Javier Martinez-Cordero**, Edgar Sánchez-Zazueta, Cristina Taddei Bringas CIAD Mazatlán y Red Tilapia México
INCOME DIVERSIFICATION IN RURAL HOUSEHOLDS DEPENDENT ON AQUACULTURE IN THE SOUTH PACIFIC OF MEXICO, AS A RESILIENCE STRATEGY
- 12.15 Yahira Piedrahita**. Directora Cámara Nacional de Acuicultura de Ecuador
Impacto de la Pandemia COVID 19 y estrategias de adaptación de la industria camaronera de Ecuador
- 12.30** General Discussion and Panel's conclusions

SPECIAL SESSION: FAO / AIPAA

Friday, May 27 14:30 - 16:10 Salon 6

14:30 Dr Audun Lem, FAO Fisheries and Aquaculture Deputy Director and IYafa Secretariat
Opening remarks

14:35 IYafa 2022 official video

Round table – 4/5 interventions (TBC)

14:38 Bill Hoenig, Global Seafood Alliance
Domestic market opportunities
Supply chain organization
Cold chain infrastructure

14:43 Han Han, CEO and founder of China Blue Sustainability, Hainan, China
Family farming
Gaining market access

14:48 Royd Mukonda, Owner of Mukasa Agro-solutions and Fish Farm Ltd - Zambia
Factors of Success
Technology and Skills
Challenges and survival amidst COVID-19

14:53 Owain Wynn-Jones, Commercial Director at Orkney Shellfish Hatchery, UK
Reintroduction of native species
Challenges and opportunities

14:58 Flavio Ventura, Owner/Trout Farmer. Peru
TBA

IYafa and beyond

15:05 Open Discussions- Q&A

15:15 Call for action and Closing

Dr Audun Lem, FAO Fisheries and Aquaculture Deputy Director and IYafa Secretariat

CATFISH

Friday, May 27 14:30 - 16:10 Salon 2A

14:30 Tairi Rabiu, Odunayo Adetuyi, Taibat Baharu
TOXICITY EFFECTS OF SMOKED AND UNMOSKED CIGARETTE BUTTS LEACHATE ON AFRICAN
CATFISH *Clarias gariepinus*

14:50 Babatunde Musa, Olusina Ajayi, Yewande Ajayi
ASSESSMENT OF ANTIBIOTICS RESIDUES IN AFRICAN CATFISH *Clarias gariepinus* FROM
AQUAFARMS IN IBADAN, NIGERIA

15:10 Babatunde O. Musa, Alvaro Hernández-Flores, Oludare Adeogun, Adekunle Oresegun
DETERMINATION OF A PREDICTIVE GROWTH MODEL FOR CULTIVATED AFRICAN CATFISH
Clarias gariepinus(BURCHELL, 1882)

MARINE INVERTEBRATES - CONTINUED

Friday, May 27 14:30 - 16:10 Salon 5B

14:30 Roberto Flores-Aguilar, Matias Arjona, Claudia Carrillo, Edith Ochoa
THE CURRENT SITUATION AND CHALLENGES OF THE ABALONE FARMING INDUSTRY IN MEXICO

FRIDAY