

SCIENTIFIC PROGRAMME

ORAL PRESENTATIONS

MONDAY 14TH SEPTEMBER 2011

10:15-10:45 Conference Keynote presentation

ROOM NAME

KN-1 WHAT HAVE WE LEARNT ABOUT ANTIVIRAL SENSING AND INTERFERONS IN FISH?

Chris Secombes* and Jun Zou

11:15-13:00 Fish and shellfish immunology I

ROOM NAME

O-001 IDENTIFICATION OF TYPE I INTERFERON GENES IN ATLANTIC COD

Ø. Kileng, I. Jensen

O-002 EXPRESSION ANALYSIS AND BIOACTIVITY STUDIES OF RAINBOW TROUT INTERLEUKIN (IL)-17A/F AND ITS RECEPTOR IL-17RA

M. M. Monte*, J. Zou, T. Wang & C. J. Secombes

O-003 *MYTILUS GALLOPROVINCIALIS* MYTICIN C: A CHEMOTACTIC MOLECULE WITH ANTIVIRAL ACTIVITY AND IMMUNOREGULATORY PROPERTIES

B. Novoa*, P. Balseiro, A. Falcó, A. Romero, S. Dios, A. Martínez-López, A. Figueras, A. Estepa

O-004 DIFFERENTIALLY EXPRESSED GENES IN TURBOT (*PSETTA MAXIMA*) AFTER INFECTION WITH VIRAL HAEMORRAGIC SEPTICAEMIA VIRUS (VHSV)

B. Novoa, P. Diaz-Rosales, P. Balseiro, S. Dios, A. Romero, P. Pereiro, A. Figueras*

O-005 BIOLOGY OF CK1 AND CK1R IN RAINBOW TROUT (*ONCORHYNCHUS MYKISS*)

T. Korytář*, J. Montero, B. Köllner, B. Dixon, C. Tafalla

O-006 SMALL GENE REGULATING RNAs ARE THEMSELVES REGULATED DURING ANTIVIRAL RESPONSES IN INFECTED RAINBOW TROUT

B.D. Schyth*, A.H. Jalali, L. Kristensen, F.S. Pedersen and N. Lorenzen

O-007 VIRULENCE INHIBITION OF FISH VIRUS BY RNA APTAMERS

T. Aoki*, S.D. Hwang, P. Punnarak, H. Kondo and I. Hirono

11:15-13:00 Host-parasite interactions

ROOM NAME

O-008 HETEROGENEITY OF MACROPHAGE ACTIVATION DURING PARASITE INFECTIONS

G.F. Wiegertjes*, I.R. Fink and M. Forlenza

O-009 IMMUNOHISTOCHEMICAL INFLAMMATORY RESPONSES IN THE GILLS OF RAINBOW TROUT (*ONCORHYNCHUS MYKISS*) INFECTED WITH THE MICROSPRODIA, *LOMA SALMONAE*

Mark D. Powell*, M. Naveed Yousaf, Dalia Dahle, Bernt Köllner, Jun J Zou, Chris Secombe³ and David J. Speare

O-010 *DIPLOSTOMUM*-INDUCED CHANGES IN AGGRESSION RATE AND TERRITORIAL BEHAVIOUR OF FISH HOST

J. Taskinen*, V.N. Mikheev, A.F. Pasternak and E.T. Valtonen

O-011 LOCAL IMMUNE RESPONSE IN ATLANTIC SALMON *SALMO SALAR* INFESTED WITH SEA LOUSE *LEPEOPHTHEIRUS SALMONIS*

C. Collins*, T. Wang, P. MacLachlan, P. Cook, S. McBeath, B. Collet

O-012 TRANSMISSION STRATEGIES OF TWO OPECOELID CERCARIAE INFECTING *GIBBULA ADANSONII* IN THE INTERTIDAL HABITAT

A. Born-Torrijos*, J. A. Raga and A. S. Holzer

O-013 HOST-PARASITE INTERACTIONS IN ACETYLCHOLINESTERASE ACTIVITY IN BALTIC HERRING AND *ANISAKIS SIMPLEX* LARVAE

M. Podolska*, K. Nadolna, B. Szostakowska, A. Was and E. Gosz

- O-014 INTERACTIONS BETWEEN THE SCUTICOCILIATE PARASITE *Philasterides dicentrarchi* AND THE IMMUNE SYSTEM OF TURBOT, *Psetta maxima* (L.)
M.C. Piazzon*, J.M. Leiro, J. Lamas

11:15-13:00 Environmental and toxicological diseases

ROOM NAME

- O-0015 HAEMOCYTIC IMMUNE RESPONSES IN ZEBRA MUSSEL (*DREISSENA POLYMORPHA*) EXPOSED TO A NONSPECIFIC PARASITE (*CRYPTOSPORIDIUM PARVUM*)
S. Betoulle*, A. Bigot, D. Auber, L. Favennec, V. Gaillet, I. Villena, A. Geffard
- O-016 GEOGRAPHICAL ISOLATION AND IMMUNOECOLOGY OF SALMONID POPULATIONS IN THE SUBANTARCTIC KERGUELEN ISLANDS.
S. Betoulle*, E. Farcy, F. Morat, A. Veron, A. Jaffal, A. Geffard, S. Chilmonczyk, E. Beall, M. Fournier
- O-017 BIOCONCENTRATION AND IMMUNOTOXICITY OF A CHRONICALLY EXPOSURE IN VIVO TO PENDIMETHALIN IN RAINBOW TROUT, *ONCORHYNCHUS MYKISS* L.
M. Danion*, S. Le Floch, R. Kanan, F. Lamour and C. Quentel
- O-018 SUSPENDED MINERAL PARTICLES AFFECT RAINBOW TROUT *ONCORHYNCHUS MYKISS*
C. Michel* and P. Burkhardt-Holm
- O-019 DEVELOPMENT OF GENOMIC RESOURCES AND TOOLS FOR HEALTH ASSESSMENT OF MARINE MUSSELS (*MYTILUS* SPP.): THE MYT-OME PROJECT
S.C. Johnson*, C. Thomson, D. Sanderson, J. Kimball and H. J. Gurney-Smith
- O-020 EFFECT OF A CHRONICALLY EXPOSURE TO PENDIMETHALIN (*DINITROAMILINE* HERBICIDE, PROWL 400®) ON THE SUSCEPTIBILITY OF RAINBOW TROUT, *ONCORHYNCHUS MYKISS* L., TO AN EXPERIMENTAL CHALLENGE TO VIRAL HAEMORRHAGIC SEPTICEMIA VIRUS (VHSV)
M. Danion*, S. Le Floch, J. Castric, J. Cabon, F. Lamour and C. Quentel

15:30-17:15 Aquatic animal epidemiology I

ROOM NAME

- O-021 INVESTIGATION OF THE GENETIC DIVERSITY OF CYPRINID HERPESVIRUS-3 (KHV) IN ENZOOTIC AREAS
A. Bentenni, Z. Zainun, A. Santika, D. Caruso, J.-P. Madeira, L. Bigarré, M. Maskur and J.-C. Avarre*
- O-022 DANISH GENOTYPE IA VHS VIRUSES CONSTITUTE A SUBGROUP DISTINCT FROM ISOLATES CAUSING OUTBREAKS IN OTHER EUROPEAN COUNTRIES
S. Kahns*, H.F. Skall, R.S. Kaas, B. Bang Jensen, S.P. Jonstrup, D. Stone, N.J. Olesen
- O-023 GENOMIC DIVERSITY OF *STREPTOCOCCUS AGALACTIAE* FROM TILAPIA AND OTHER AQUATIC HOSTS
C. M. J. Delannoy*, M. Crumlish, M. C. Fontaine, J. F. Turnbull, R. N. Zadoks
- O-024 PHYLOGEOGRAPHIC DISTRIBUTION OF INFECTIOUS SALMON ANAEMIA (ISAV) HPR0 SUB TYPES IN FARMED ATLANTIC SALMON IN NORWAY
T.M. Lyngstad, M.J. Hjortaas, A.B. Kristoffersen, M. Devold, V. Aspehaug, A. Østvik, R. B. Larssen, P.A. Jansen
- O-025 EXPLORATORY SPACE-TIME ANALYSES OF A LARGE DATASET ON SEA LICE ABUNDANCE ON FARMED SALMON IN NORWAY
P.A. Jansen, A.B. Kristoffersen, H. Viljugrein, D. Jimenez and A. Stien
- O-026 A DYNAMIC MODEL FOR ON-FARM, PERIODIC PARASITE CONTROL
D.M. Green*, A.P. Shinn & N.G.H. Taylor

15:30-17:15 Bivalve and crustacean diseases

ROOM NAME

- O-027 DISTRIBUTION OF *BONAMIA EXITIOSA* IN FLAT OYSTER *OSTREA EDULIS* POPULATIONS IN EUROPE.
I. Arzul*, R. Aranguren, G. Arcangeli, D. Chesslett, M. Engelsma, A. Figueras, C. Garcia, F. Geoghegan, C. Magnabosco, D. Stone

- O-028 DIGENEAN TREMATODES AND HAPLOSPORIDIAN PROTOZOANS ASSOCIATED WITH SUMMER MORTALITY OF COCKLES CERASTODERMA EDULE IN THE OOSTERSCHELDE, THE NETHERLANDS
M.Y. Engelsma, I. Roozenburg, M. Voorbergen-Laarman, A. Van den Brink, K. Troost, T. Ysebaert, K. Bateman and M. Longshaw
- O-029 POTENTIAL INVOLVEMENT OF THE COPEPOD PARACARTIA LATISETOSA IN MARTEILIA REFRINGENS LIFE CYCLE IN DIANA LAGOON (CORSICA, FRANCE)
I. Arzul*, B. Chollet, D. Bonnet, M. Robert, J.P. Joly, C. Garcia and M. Bouchoucha
- O-030 DETECTION OF MIKROCYTOS LIKE PROTOZOANS DURING MORTALITY EVENTS OF THE SHELLFISH DONAX TRUNCULUS, IN FRANCE.
C. Garcia*, I. Arzul, J.P. Joly, B. Guichard, B. Chollet, E. Omnes, C. Haond, M. Robert, C. Lupo, C. François
- O-031 WHERE HAVE ALL THE PEARLERS GONE? WHAT WE HAVE LEARNED OF OYSTER OEDEMA DISEASE IN AUSTRALIA.
M. Crockford, and J.B. Jones*
- O-032 MOLECULAR DETECTION OF INFECTIOUS HYPODERMAL AND HAEMATOPOIETIC NECROSIS VIRUS (IHHNV) IN FARMED PENAEUS MONODON IN QUEENSLAND
N.J.G. Moody*, L.M. Williams, K.R. Davies, G.A. Carlile, J. Young, J.R. White, T. Pye, E. Hansson, T. McDonald, A.J. Foord and M.St.J. Crane

15:30-17:15 Bacterial diseases I

ROOM NAME

- KN-2 EPITHELIOCYSTIS AGENT –A PATHOGEN OR INNOCENT BYSTANDER?
Barbara Nowak
- O-033 EVIDENCE FOR A NON-CHLAMYDIAL AGENT OF EPITHELIOCYSTIS IN ATLANTIC SALMON
S.O. Mitchell*, E.R. Toenshoff, A. Kvellestad, T. Steinum, K. Falk, D.J. Colquhoun and M. Horn
- O-034 PROGRESSION OF BKD IN ARCTIC CHAR IN TWO CHALLENGE TRIALS
I.O. Arnason*, S. Gudmundsdottir, A. Kristmundsson
- O-035 CHARACTERISATION OF A TANDEM REPEAT POLYMORPHISM IN RENIBACTERIUM SALMONINARUM AND ITS USE IN MANAGEMENT OF THE BACTERIAL KIDNEY DISEASE IN SCOTTISH AQUACULTURE
I. Matejusova*, N. Bain, U. McCarthy, M. Snow and A.G. Murray

TUESDAY, 13TH SEPTEMBER 2011

9:00-10:45 Immunostimulants I

ROOM NAME

- KN-3 USE OF IMMUNOSTIMULANTS IN FISH FEED - AN INDUSTRY PERSPECTIVE
Obach A., McGurk C., Jensen L., Kallelid E
- O-036 EFFECT OF β -GLUCAN IMMUNOMODULATION AND AEROMONAS SALMONICIDA INFECTION ON THE PROFILE OF INNATE IMMUNE PROTEINS IN COMMON CARP (CYPRINUS CARPIO)
N.P.M. Pionnier*, A. Falco, J.J.Miest, P. Frost, I.Irnazarow, and D. Hoole
- O-037 THE EFFECT OF β -GLUCAN ON COMMON CARP (CYPRINUS CARPIO L.) IMMUNOGLOBULIN LEVELS DURING AEROMONAS SALMONICIDA INFECTION
P.Frost*, G.Sych, P. Jurecka and I.Irnazarow
- O-038 MEASUREMENT OF THE β -GLUCAN INDUCED IMMUNOSTIMULATION IN CARP (Cyprinus carpio) USING REAL-TIME OXIDATIVE BURST ASSAY
N.I Vera-Jiménez*, D. Pietretti, G.F. Wiegertjes and M.E. Nielsen
- O-039 BETA-GLUCANS PROMOTE WOUND HEALING IN COMMON CARP (CYPRINUS CARPIO L.)
D. Przybylska*, J.G. Schmidt and M.E. Nielsen
- O-040 APOPTOSIS IN COMMON CARP (CYPRINUS CARPIO) - EFFECT OF BETA-GLUCAN AND AEROMONAS SALMONICIDA INFECTION

J.J.Miest*, A. Falco, N.P.M. Pionnier, P. Frost, I.Irnazarow, and D. Hoole

9:00-10:45 Aquatic animal epidemiology II

ROOM NAME

- O-041 PD-VACCINE IS EFFECTIVE IN REDUCING SEVERITY OF DISEASE OUTBREAKS IN NORWEGIAN AQUACULTURE
B. Bang Jensen*, A.B. Kristoffersen, C. Myr² and E. Brun
- O-042 ELEVATED MORTALITY AS AN INDICATOR OF PRESENCE OF DISEASE
S. Soares*, A.G. Murray, M. Crumlish, J.F. Turnbull, D.M. Green
- O-043 PROPOSAL FOR A RISK BASED SURVEILLANCE PROGRAM OF SWISS FISH FARMS IN ACCORDANCE WITH THE EU DIRECTIVE 2006/88/EC
N. Diserens*, D. Bernet, G. Schupbach, T. Wahli
- O-044 MarineHealth.org: AN INTELLIGENCE SYSTEM FOR AQUATIC ANIMAL HEALTH
A. Lyon* and G. Grossel
- O-045 ASSESSMENT OF THE SAFETY OF AQUATIC ANIMAL COMMODITIES FOR INTERNATIONAL TRADE: THE OIE AQUATIC ANIMAL HEALTH CODE
B. Oidtmann*, C. Johnston, K. Klotins, G. Mylrea, P. T. Van, S. Cabot, L. Ababouch, F. Berthe
- O-046 RISK BASED SURVEILLANCE FOR VIRAL HAEMORRHAGIC SEPTICAEMIA (VHS) IN NORWEGIAN SALMONID FARMS
T.M. Lyngstad, S. Tavornpanich, H. Viljugrein, B. Bang Jensen, E. Brun, H. Hellberg*
- O-047 EPIZOOTIC RISK ANALYSIS OF LOWER SAXONY AQUACULTURE PRODUCTION BUSINESS
D.W.Kleingeld*, G. Hörstgen-Schwark and C.-P. Czerny

9:00-10:45 Myxozoa I

ROOM NAME

- O-048 MOTILITY, 3D MORPHOLOGY AND DEVELOPMENT OF CERATOMYXA PUNTAZZI IN THE BILE OF DIPLodus PUNTAZZO
G. Alama-Bermejo*, J.E. Bron, J.A. Raga and A.S. Holzer
- O-049 COMPARISON OF POPULATION GENETICS OF PARVICAPSULA MINIBICORNIS AND CERATOMYXA SHASTA – TWO PROBLEMATIC MYXOZOAN PARASITES OF SALMONIDS.
S.D. Atkinson*, M.E.T. Stinson, S.R.M. Jones, R.D. Adlard and J.L. Bartholomew
- O-050 SPHAEROSPORA SENSU STRICTO CLADE (MYXOZOA): TAXONOMY AND PHYLOGENY BASED ON THE RIBOSOMAL AND PROTEIN-CODING DATA
P. Bartošová*, I. Fiala, M. Cinková, D. Sipos, E. Eszterbauer, M. Jirků, M. Caffara, M. L. Fioravanti and A. S. Holzer
- O-051 GLYCOPROTEIN CHANGES IN THE INTESTINAL MUCUS OF GILTHEAD SEA BREAM SPARUS AURATA PARASITIZED BY ENTEROMYXUM LEEI (MYXOZOA)
I. Estensoro*, V. Jung-Schroers, D. Steinhagen, A. Sitjà-Bobadilla
- O-052 ORIGIN OF HENNEGUYA ZSCHOKKEI S.L. (MYXOZOA) IN CULTIVATED (AND WILD) WHITEFISH IN BRACKISH WATER AND WAYS OF CONTROL
H.-P. Fagerholm* and Tom Wiklund
- O-053 PHYLOGENY OF CERATOMYXA SPECIES (MYXOZOA) BASED ON THE ANALYSIS OF THREE GENES: VERIFYING THE POSITION OF C. SHASTA
I. Fiala*, M. Hlavničková, M. A. Freeman, S. D. Atkinson and P. Bartošová

11:15-13:00 Immunostimulants II

ROOM NAME

- O-054 ORALLY ADMINISTERED IMMUNOSTIMULANTS AFFECT INFLAMMATORY GENE EXPRESSION AND SEA LICE (LEPEOPHTHEIRUS SALMONIS) BURDENS ON ATLANTIC SALMON (SALMO SALAR)
J. M. Covello, S. L., Purcell, J.F. Burka, R.J.F. Markham, A.W. Donkin, D.B. Groman, M.D. Fast*
- O-055 DOSAGE EFFECTS OF ORALLY ADMINISTERED IMMUNOSTIMULANTS ON ATLANTIC SALMON (SALMO SALAR) INFLAMMATORY GENE EXPRESSION AND SUBSEQUENT SEA LICE (LEPEOPHTHEIRUS SALMONIS) INFECTION

- J.M. Covello*, S.L. Purcell, S.L. Wadsworth, M.D. Fast
 O-056 EXPRESSION ANALYSIS OF GENES INVOLVED IN INFLAMMATORY RESPONSE
 IN COMMON CARP (CYPRINUS CARPIO L.) FED WITH β -GLUCAN SUPPLEMENTS
 A. Falco*, J. J. Miest, N. Pioneer, P. Frost, I. Irnazarow and D. Hoole
 O-057 THE INFLUENCE OF BETA-GLUCAN ENRICHED FEEDING ON THE EXPRESSION
 LEVELS OF MUCINS, ANTIMICROBIAL PEPTIDES AND LYSOZYME IN MUCOSAL
 TISSUES OF COMMON CARP (CYPRINUS CARPIO).
 M. Adamek*, M. van der Marel, G. Brogden, P. Frost², D. Steinhagen
 O-058 MOLECULAR AND FUNCTIONAL CHARACTERIZATION OF TOLL-LIKE
 RECEPTOR-1 IN COMMON CARP (CYPRINUS CARPIO)
 I.R. Fink*, M. Forlenza and G.F. Wiegertjes
 O-059 MOLECULAR AND FUNCTIONAL CHARACTERIZATION OF SCAVENGER
 RECEPTOR CLASS F MEMBER 1 (SCARF1) AND CD36 IN COMMON CARP
 (CYPRINUS CARPIO)
 A. E. Østergaard*, I. R. Fink, A. Sukinta and G. F. Wiegertjes
 O-060 MOLECULAR AND FUNCTIONAL CHARACTERIZATION OF TOLL-LIKE
 RECEPTOR 4 IN COMMON CARP (CYPRINUS CARPIO)
 D. Pietretti*, I.R. Fink, M. Forlenza and G.F. Wiegertjes

11:15-13:00 Virus and viral diseases I

ROOM NAME

- O-061 INFECTIOUS SALMON ANAEMIA VIRUS IS AN ENDOTHELIO-TROPIC VIRUS, AND
 CELL TROPISM IS DETERMINED BY THE 4-O-ACETYLATED SIALIC ACID
 RECEPTOR
 M. Aamelfot*, O. B. Dale, S. Weli, E. O. Koppang and K. Falk
 O-062 CHARACTERISATION AND COMPARISON OF THE FULL 3' AND 5'
 UNTRANSLATED GENOMIC REGIONS OF DIVERSE ISOLATES OF INFECTIOUS
 SALMON ANAEMIA VIRUS BY USING A RAPID AND UNIVERSAL METHOD.
 M.C. Fourrier*, S. Heuser, J.A. Low, E.S. Munro and M. Snow
 O-063 MOLECULAR EPIDEMIOLOGY OF LOW-PATHOGENIC INFECTIOUS SALMON
 ANEMIA VIRUS (ISAV-HPR0) IN FRESHWATER FARMED ATLANTIC SALMON
 SMOLT IN THE FAROE ISLANDS
 D.H. Christiansen* and P.S. Østergaard
 O-064 A POTENTIAL ROLE FOR ALTERNATE HOSTS IN THE PERSISTENCE AND
 SPREAD OF VHS TYPE IVB VIRUS WITHIN THE GREAT LAKES OF NORTH
 AMERICA: TURTLES, LEECHES, AND AMPHIPODS
 A.E. Goodwin*, G.E. Merry, C. Schulz, A. Winters, and M. Faisal
 O-065 VIRAL HAEMORRHAGIC SEPTICAEMIA VIRUS IN WILD AND FARMED FISH IN
 NORWAY VHSV-WILD-FARMED
 Renate Johansen, Nina Sandlund, Ingebjørg Modahl, Attila Tarpai, Ann Cathrine B. Einen,
 Rolf H. Olsen, Anne Kristin Jøranlid, Arve Kristiansen, Trude Marie Lyngstad, Irene
 Ørpetveit, Britt Gjerset and Øivind Bergh
 O-066 SPECIFIC REGULATION OF THE CHEMOKINE RESPONSE TO VIRAL
 HEMORRHAGIC SEPTICEMIA VIRUS (VHSV) AT THE ENTRY SITE
 J. Montero, J. Garcia, M.C. Ordás and C. Tafalla*

11:15-13:00 Myxozoa II

ROOM NAME

- O-067 CHEMICAL HOST RECOGNITION IN MYXOSPOREA
 D. M. Kallert*, W. Bauer, E. Eszterbauer, S. Ponader, S. Adelt, P. Kaese, R. Geyer, W. Haas
 and M. El-Matbouli
 O-068 THE SUSCEPTIBILITY OF DIVERSE SPECIES OF CULTURED OLIGOCHAETES FOR
 THE FISH PARASITE, MYXOBOLUS PSEUDODISPAR
 Sz. Marton*, D. Kallert, E. Eszterbauer
 O-069 MODULATION OF THE GENE EXPRESSION OF IgM AND DISTRIBUTION OF IgM⁺
 CELLS BY NUTRITIONAL BACKGROUND AND INFECTION BY ENTEROMYXUM
 LEEI (MYXOZOA) IN GILTHEAD SEA BREAM (SPARUS AURATA)
 I. Estensoro*, J.A. Calduch-Giner, S. Kaushik, J. Pérez-Sánchez, A. Sitjà-Bobadilla
 O-070 DIETARY NICARBAZIN REDUCES THE PREVALENCE AND SEVERITY OF KUDOVA

THYRSITES (MYXOSPOREA: MULTIVALVULIDA) IN ATLANTIC SALMON SALMO SALAR POST-SMOLTS

S. Jones*, I. Forster and M. Ikonomou

O-071 RE-EXAMINATION OF CERATOMYXA SHASTA GEOGRAPHIC AND HOST DISTRIBUTION BASED ON ITS-1 GENOTYPES

M.E.T. Stinson, C.N. Hurst, S.D. Atkinson & J.L. Bartholomew*

15:30-17:15 Workshop: Immunostimulants
ROOM NAME

15:30-17:15 Diseases of uncertain etiology
ROOM NAME

O-072 MORPHOLOGICAL AND HISTOPATHOLOGICAL CHARACTERIZATION OF LYMPHOMA IN CULTURED TENCH (*Tinca tinca*)

R. Bermúdez*, M. Quiroga, C. Zarza, H. J. Pula and F. Padrós

O-073 RED MARK SYNDROME/COLD WATER STRAWBERRY DISEASE: EMERGENCE IN ITALY AND HISTOPATHOLOGICAL INVESTIGATIONS

M. Galeotti, R. Giavenni, D. Volpatti, P. Beraldo, S.W. Feist

O-074 FURTHER EVIDENCE ON THE CAUSE OF RED MARK SYNDROME IN RAINBOW TROUT (*ONCORHYNCHUS MYKISS*)

M. Metselaar*, R. Paley, K. Thompson, S. LaPatra, D. Call, S. Feist, E. Peeler, D. Verner-Jeffreys, D. Stone and A. Adams

O-075 USING HIGH THROUGHPUT SEQUENCING TO LOOK FOR UNKNOWN PATHOGENS

Dr. Torstein Tengs

15:30-17:15 Workshop: Myxozoa

WEDNESDAY, 14TH SEPTEMBER 2011

9:00-10:45 Aquatic animal epidemiology III
ROOM NAME

O-076 INVESTIGATING A “SIMULTANEOUS” FISH AND BIRD KILL: POLITICS, PERCEPTION, PATHOLOGY, AND THE END OF THE WORLD

A.E. Goodwin*, and K.R. Winningham

O-077 SITUATION OF WILD BEDS OF *Crassostrea gigas* REGARDING OsHV-1 μ VAR: SPATIOTEMPORAL DESCRIPTION OF CONTAMINATION IN PACIFIC OYSTER WILD BEDS IN MARENNES OLERON BAY (FRANCE, 2010)

J.F Pépin *, P. Soletchnik, C. Lupo., P. Geairon, J. L. Seugnet, S. Robert, I. Bernard, O. Le Moine

O-078 EPIDEMIOLOGICAL STUDY OF CARDIOMYOPATHY SYNDROME (CMS) IN FARMED ATLANTIC SALMON, *SALMO SALAR* IN NORWAY

B. Fineid, M. Alarcon, B. Bang Jensen, RB. Larssen, AB. Kristoffersen and E. Brun

O-079 OCCURRENCE OF VIRAL HAEMORRHAGIC SEPTICAEMIA VIRUS (VHSV) IN WHITING (*Merlangius merlangus*) AND ITS VIRULENCE ON THREE TROUT SPECIES: BLACK SEA TROUT (*Salmo trutta labrax*), RAINBOW TROUT (*Oncorhynchus mykiss*) AND BROOK TROUT (*Salvelinus fontinalis*)

H. Ogut and C. Altuntas

O-080 RESERVOIRS OF *RENIBACTERIUM SALMONINARUM* IN WILD SALMONIDS IN ICELAND

S. Gudmundsdottir*, S. Helgason, I. O. Arnason, A. Kristmundsson

O-081 SUSCEPTIBILITY OF TENCH (*TINCA TINCA*), COMMON CARP (*CYPRINUS CARPIO*), BROWN TROUT (*SALMO TRUTTA*), AND MULLET (*CHELON LABROSUS*) TO *APHANOMYCES INVADANS*—WHAT EUS MIGHT LOOK LIKE IN EUROPE

B. Oidtmann*, S. Feist, J. Barber, R. Paley

9:00-10:45 Bacterial diseases II

ROOM NAME

- O-082 WHOLE GENOME SEQUENCING: THE FUTURE FOR MOLECULAR EPIDEMIOLOGICAL STUDIES ON AQUATIC PATHOGENS?
D.W. Verner-Jeffreys*, C. Baker-Austin, C. Amaro, D. Colquoun, M. Febrer, E.J. Feil, P.A. Gulig, U. McCarthy, K. McLay, J.D. Oliver, L. Rhodes, G.D. Wiens
- O-083 GRASS CARP MORTALITY IN NORTHERN VIETNAM - INVESTIGATIONS FROM 2008-2010
R. Mayrhofer*, H. Soliman, J. Pucher, U. Focken, M. El-Matbouli
- O-084 TYPICAL AND ATYPICAL AEROMONAS SALMONICIDA ISOLATED FROM MORIBUND MORONIDAE (TEMPERATE BASSES)
A.E. Goodwin*, R.C. Cipriano, W.B. Schill
- O-085 COMPARATIVE GENOMICS OF EDWARDSIELLA TARDA USING THE NEXT GENERATION SEQUENCER
Y. Nakamura*, T. Takano, M. Yasuike, and M. Sano
- O-086 VIRULENCE DETERMINANTS IN FISH ISOLATES OF STREPTOCOCCUS AGALACTIAE
H.C.P. Figueiredo*, D.T. Godoy, G.A. Carvalho-Castro, U.P. Pereira, C.A.G. Leal, R.C. Leite

9:00-10:45 Virus and viral diseases II

ROOM NAME

- O-087 INFECTION PROFILES INDUCED BY DIFFERENT GENOGROUPS OF AQUABIRNAVIRUS
A.A.A. Gamil*, S. Mutoloki and Ø. Evensen
- O-088 IDENTIFICATION OF IPNV PROTEINS THAT ANTAGONIZE INTERFERON SYNTHESIS
S. Lauksund*, A. Skjesol, J. Jørgensen and B. Robertsen
- O-089 INFECTION BIOLOGY OF INFECTIOUS PANCREATIC NECROSIS VIRUS: CORRELATING INFECTION PROGRESSION WITH THE EXPRESSION OF HOST DEFENSINS
H.M. Munang'andu, B.N. Fredriksen, S. Mutoloki*, R.A. Dalmo and Ø. Evensen
- O-090 EVASION OF INNATE IMMUNITY BY IPNV VP3
A. Skjesol*, T. E. Hansen, L. Greiner-Tollersrud and J. B. Jørgensen
- O-091 HIGH AND LOW VIRULENT GENOTYPES OF INFECTIOUS PANCREATIC NECROSIS VIRUS ARE NOT COUPLED IN SEQUENCE SPACE IN A COMPLEX IN VIVO ENVIRONMENT
Koestan Gadan, Ane Sandtrø, Inderjit S. Marjara, Nina Santi, Øystein Evensen*
- O-092 COMPARISON OF PCR AND VIRUS ISOLATION ON PISCINE CELL LINES FOR TSRV DETECTION
S. Zainathan*, J. Carson, MStJ. Crane, H. Aiken, N. Moody, L. Williams and B. Nowak
- O-093 UTILIZING HYDRODYNAMIC MODELS TO ESTIMATE A CONNECTIVE NETWORK FOR PANCREAS DISEASE TRANSMISSION IN SALMON FARMING
A. Stene, P.A. Jansen and H. Viljugrein and S. Tavornpanich

11:15-13:00 Fish and shellfish immunology II

ROOM NAME

- O-094 MUCOSAL AND NON-MUCOSAL CD8ALPHA POSITIVE T-CELLS SHOW PHENOTYPIC DIFFERENCES IN RAINBOW TROUT (ONCORHYNCHUS MYKISS)
F. Takizawa, J.M. Dijkstra, U. Fischer*
- O-095 T-CELL SUBPOPULATIONS IN LYMPHOID AND MUCOSAL ORGANS IN RAINBOW TROUT (ONCORHYNCHUS MYKISS) – INVESTIGATION WITH NEWLY ESTABLISHED T-CELL SPECIFIC MABS
H.T. Dang, T. Korytář, J. Jaros, U. Fischer, F. Takizawa, and B. Köllner*
- O-096 CHARACTERIZATION OF IGT AND IGT⁺ B CELLS IN SKIN AND GILLS OF RAINBOW TROUT
X. Zhen, I. Salinas, Y.A. Zhang, D. Parra and J.O. Sunyer*
- O-097 FUNCTIONAL CHARACTERIZATION OF PENAEID SHRIMP IMMUNE SYSTEM BY

RNAI TECHNOLOGY

- O-098 A. Shitara, H. Yamada, R. Inoue, A. Kaizu, H. Kondo, I. Hirono
CORRELATES OF THE HUMORAL IMMUNE RESPONSE IN ATLANTIC SALMON
(*Salmo salar* L) VACCINATED WITH INACTIVATED, OIL-ADJUVANTED VACCINES
Hetron M Munang'andu*, BN Fredriksen, S Mutoloki, RA Dalmo and Ø Evensen
- O-099 IDENTIFICATION OF MAJOR ANTIGENIC PROTEINS FROM THE CAUSATIVE
BACTERIUM OF BACTERIAL HEMOLYTIC JAUNDICE IN YELLOWTAIL, *SERIOLA*
QUINQUERADIATA
K. Yamashita*, Y. Nakamura, T. Sakai, T. Matsuyama, T. Takano, C. Nakayasu, K. Kimoto,
Y. Fukuda, H. Kondo and I. Hirono

11:15-13:00 Diagnostics, prophylaxis and treatment I

ROOM NAME

- O-100 AN INVESTIGATION INTO THE EXISTENCE OF KOI HERPESVIRUS DERIVED
MICRO-RNAS
O. Donohoe*, K. Henshilwood, K. Way, D. Stone, D. Walls
- O-101 PATHOLOGY OF A NATURAL OUTBREAK OF TENACIBACULOSIS IN SOLE
(*SOLEA SENEGALENSIS*)
L.D. Failde*, A.P. Losada, R. Bermúdez, P. García-González, Y. Santos and M.I. Quiroga
- O-102 DEVELOPMENT OF AN IMAGE ANALYSIS TOOL TO EVALUATE MORPHOMETRIC
CHANGES IN SALMONID GILLS: A PRELIMINARY STUDY
N.S. Jayasuriya*, J.E. Bron, A. Adams, J.E. Mullins, C. McGurk and
K.D. Thompson
- O-103 APPLICATIONS OF SEROLOGICAL DIAGNOSTICS FOR NOTIFIABLE DISEASES IN
AQUACULTURE: DEVELOPMENTS AND CHALLENGES OF DIVA
(DIFFERENTIATING INFECTED FROM VACCINATED ANIMALS) STRATEGIES
S.J. Monaghan*, D.M. Chee, K.D. Thompson, M. Leaver, S. M. Bergmann, N. Auchinache,
K. Muir, T.S. Jung, T. Aoki, A. Adams
- O-104 IMPLEMENTATION OF BETANODAVIRUS DIAGNOSTIC TESTS IN AUSTRALIA
N.J.G. Moody*, I.G. Anderson, R.J. Whittington and M.St.J. Crane
- O-105 ISOLATION OF ANTIGEN SPECIFIC V-REGION MOLECULE FROM ARTIFICIALLY
RANDOMIZED IGNAR PHAGE DISPLAY LIBRARY
M. Ohtani*, J. Hikima, S. Suda, H. Kondo, I. Hirono, TS. Jung and T. Aoki
- O-106 DIAGNOSIS OF EPIZOOTIC ULCERATIVE SYNDROME (EUS) IN EUROPEAN
SPECIES: A COMPARATIVE STUDY OF ISOLATION, PCR AND HISTOPATHOLOGY
R. Paley*, S. Feist, J. Barber, M. Mackie and B. Oidtmann

11:15-13:00 Parasitic diseases I

ROOM NAME

- KN-4 SPIRONUCLEUS SPP: VERSATILE FISH PATHOGENS, EXCEPTIONAL
FLAGELLATES
S. L. Poynton *
- O-107 TRANSFORMATION OF TROPHOZOITE TO CYST IN THE PISCINE DIPLOMONAD
SPIRONUCLEUS SALMONIS: AN ULTRASTRUCTURAL STUDY
A. Jørgensen*, S. L. Poynton, E. Sterud and M. J. Delannoy
- O-108 PROLIFERATIVE KIDNEY DISEASE (PKD) IN ICELAND – POSSIBLE NEGATIVE
IMPACT ON WILD SALMONID POPULATIONS -
Á. Kristmundsson*, Th. Antonsson and F. Árnason
- O-109 MOLECULAR CHARACTERIZATION OF RAINBOW TROUT (*ONCORHYNCHUS*
MYKISS) IMMUNE RESPONSES ELICITED DURING PROLIFERATIVE KIDNEY
DISEASE: A REAL-TIME PCR SURVEY.
B. Gorgoglione*, J. W. Holland, T. Wang & C. J. Secombes
- O-110 NEW EMACIATIVE DISEASE OF ONGROWING GILT HEAD SEA BREAM CAUSED
BY A NUCLEOSPORA-LIKE INTESTINAL MICROSPORIDIAN
O. Palenzuela, M.J. Redondo and A. Sitjà-Bobadilla
- O-111 PHYLOGENETIC POSITION OF THE COCCIDIA CEPHALOPOD PARASITES
Aggregata octopiana and *Aggregata eberthi* FROM THE NE ATLANTIC COAST
S. Castellanos-Martínez*, M. Pérez-Losada and C. Gestal

THURSDAY 15TH SEPTEMBER 2011

9:00-10:45 Parasitic diseases II

ROOM NAME

- O-119 INFECTION LEVELS AND DIVERSITY OF ANISAKID NEMATODE LARVAE IN PAGELLUS BOGARAVEO FROM PORTUGUESE WATERS
M. Hermida*, R. Mota, C. Pacheco, C. Cruz, A. Saraiva and P. Tamagnini
- O-120 A NEWLY IDENTIFIED PARASITE IN CULTURED MULLOWAY (ARGYROSUMUS JAPONICUS) IN WESTERN AUSTRALIA
D. Zilberg*, B. Jones, P. Nichols, M. A. A. Burger, and F. Stephens
- O-121 THE FREQUENCY OF FISH-BORN PARASITIC ZOOZOITES WITHIN THE ROMANIAN AREA OF THE BLACK SEA
Laura Daniela Urdes*, Cristiana Diaconescu, C.D. Cojocaru and St. Diaconescu
- O-122 COMPARITIVE PARASITE FAUNA BETWEEN A COSMOPOLITAN, GAMBUSIA AFFINIS BAIRD & GIRARD 1853 AND AN ENDEMIC, APHANIUS DANFORDII BOULENGER, 1890 CYPRINODONT SPECIES
A. Özer*, and T. Öztürk
- O-123 PARASITE FAUNA OF THE THREE-SPINED STICKLEBACK, GASTEROSTEUS ACULEATUS L., 1758, A FISH SPECIES OF WIDESPREAD IN THE BALKAN COUNTRIES
T. Öztürk* and A. Özer
- O-124 INNATE IMMUNE PARAMETERS OF EUROPEAN EEL (ANGUILLA ANGUILLA) IN FRENCH MEDITERRANEAN LAGOONS
S. Betoulle*, E. Amilhat, R. Lecomte-Finiger, P. Sasal, S. Biagianti, E. Faliex

9:00-10:45 Fish and shellfish immunology III

ROOM NAME

- O-112 EFFECT OF IMMUNIZATION ROUTE ON MUCOSAL AND SYSTEMIC IMMUNE RESPONSE IN ATLANTIC SALMON (SALMO SALAR)
V.A. Valdenegro-Vega*, P. Crosbie, B.N. Vincent, M. Cook, B.F. Nowak
- O-113 ALTERNATIVE STRATEGIES TO EVALUATE THE EFFICACY OF VACCINATION IN RAINBOW TROUT (ONCORHYNCHUS MYKISS)
S. LaPatra*, W. Shewmaker, R. Burkhart, M. Higgins and A. Morton
- O-114 DNA IMMUNIZATION WITH A SECRETABLE FORM OF VIRAL HAEMORRHAGIC SEPTICAEMIA VIRUS (VHSV) G GLYCOPROTEIN BY INTRAPERITONEAL INJECTION INDUCE PROTECTIVE IMMUNITY IN FISH.
Martinez-Lopez A.*, Parra-Gomez, D., Perez, L, Coll, J.M., Sunyer, O and Estepa A
- O-115 DOSE RESPONSE TO A SALMON ALPHAVIRUS (SAV) DNA VACCINE FOR SALMON IN ATLANTIC SALMON, SALMO SALAR
N.C. Simard*, V. Hay, L. Phillips, A. Garland, D. Groman, and M. J. Forzán
- O-116 DNA VACCINATION OF TURBOT AGAINST VIRAL HAEMORRHAGIC SEPTICAEMIA VIRUS (VHSV).
N. Lorenzen, J. S. Rasmussen, T. E. Kjær, K. Einer-Jensen, K. Engell-Sørensen, Kim Thompson and E. Lorenzen
- O-117 ENHANCING THE POTENCY OF DNA VACCINE TO SVCV
Garcia-Valtanen, P*, Martinez-Lopez A., Chico, V., M Ortega-Villaizan, Perez, L, Coll, J.M., and Estepa A
- O-118 INSUFFICIENT PROTECTION OF RAINBOW TROUT AGAINST FURUNCULOSIS BY COMMERCIAL VACCINES UNDER EXPERIMENTAL CONDITIONS.
E. Lorenzen, T. E. Kjær, N. H. Henriksen, I. Dalsgaard, L. Holten-Andersen, J. Nylen, S. B. Madsen, K. Buchmann and N. Lorenzen*

9:00-10:45 Workshop: Nodavirus

ROOM NAME

11:15-13:00 Diagnostics, prophylaxis and treatment II

ROOM NAME

- O-125 AN INVESTIGATION INTO THE EXISTENCE OF KOI HERPESVIRUS DERIVED MICRO-RNAS
O. Donohoe*, K. Henshilwood, K. Way, D. Stone, D. Walls
- O-126 A GLOBAL TAQMAN BASED REAL TIME RT-PCR ASSAY SUITABLE FOR SURVEILLANCE AND DIAGNOSIS OF VIRAL HAEMORRHAGIC SEPTICAEMIA VIRUS
S.P. Jonstrup, S. Kahns, H.F. Skall, T.S. Boutrup, N.J. Olesen*
- O-127 POTENTIAL PROBIOTIC AGAINST RAINBOW TROUT FRY SYNDROME
T.L. Korkea-aho*, J. Heikkinen, K. D. Thompson, A. von Wright and B. Austin
- O-128 REARING SALMON PARR IN ENRICHED TANKS MAY BE USED IN THE PREVENTION OF ICHTHYOPHTHIRIUS MULTIFILIIS
P. Koski*, M. Aalto, P. Anttila and P. Hyvärinen
- O-129 VACCINATION OF ATLANTIC SALMON AGAINST YERSINIA RUCKERI
A. Bridle, M. Leef, J. Carson and B. Nowak*
- O-130 TISSUE DISTRIBUTION AND DEPLETION OF SULFADIAZINE AFTER A MULTIPLE PER OS DOSING IN GILTHEAD SEA BREAM, SPARUS AURATA FED CONVENTIONAL AND PLANT OIL-BASED DIETS
G. Rigos*, V. Zonaras, M. Henry, E. Cotou, X. Nikoloudaki, I. Nengas and M. Alexis

11:15-13:00 Nutrition and fish health

ROOM NAME

- O-131 INNATE IMMUNE RESPONSE AND INTESTINAL MORPHOLOGY OF GILTHEAD SEA BREAM (SPARUS AURATA L.) FED DIFFERENT INCLUSION LEVELS OF SOY PROTEIN CONCENTRATE
F. Kokou*, G. Rigos, M. Henry, M. Kentouri and M. Alexis
- O-132 BLOOD BIOCHEMISTRY FOR ASSESSING THE IMPACT OF FUNCTIONAL NUTRITION ON PATHOGENESIS OF SALMON PANCREAS DISEASE (PD).
C. McGurk*, E. Kallelid, Ø. Røn, M.F. McLoughlin, R. Aukan and A. Obach
- O-133 CYTOTOXICITY AND IMMUNOTOXICITY OF DEOXYNIVALENOL (DON) AND ZEARALENONE (ZEN) IN FISH CELLS IN VITRO
C. Pietsch
- O-134 EFFECTS OF DIET AND VITAMIN C ENRICHMENT ON THE PATHOLOGY OF CARDIOMYOPATHY (CMS) IN ATLANTIC SALMON, SALMOSALAR.
Mark D. Powell*, M. Naveed Yousaf, Gjermund Bahr and Johan Johansen
- O-135 DEVELOPMENT OF A SEMI-AUTOMATED CLASSIFICATION SYSTEM TO EXAMINE THE EFFECTS OF DIETARY COMPONENTS ON THE GUT MORPHOLOGY OF ATLANTIC SALMON BASED ON ADVANCED IMAGE ANALYSIS
P. Silva*, C. McGurk, K.D. Thompson, A. Adams, J.E. Mullins and J.E. Bron
- O-136 EFFECT OF SHORT-TERM STARVATION ON MACROPHAGE RESPIRATORY BURST
M. Villarroel, J.A. Garcia*

11:15-13:00 Workshop: Eel diseases

ROOM NAME

15:30-17:15 Virus and viral diseases III

ROOM NAME

- O-137 STUDY OF THE TEMPERATURE EFFECTS ON NODAVIRUS REPLICATION IN SOLE
S. Souto*, J. G. Oliveira, C. P. Dopazo and I. Bandín
- O-138 INVESTIGATION ON MORTALITY OF WILD GOLDEN GREY MULLET (LIZA AURATUS) ASSOCIATED WITH VIRAL NERVOUS NECROSIS (VNN): AN EMERGING DISEASE IN IRANIAN WATERS OF THE CASPIAN SEA
M.J. Zorriehzahra, M. Ghasemi, M. Ghiasi, A. Nazari, S. Haghghi Karsidani, G. Bovo, M.D. Hassan, M. Soltani, I. Sharifpour, M.S. Rohani, P. Seifouri, J. Najafi and A. Nouri
- O-139 VIRAL ENCEPHALOPATHY AND RETINOPATHY IN FRESHWATER FISH FARMED IN ITALY
Bovo G., Gustinelli A., Quaglio F., Gobbo F., Panzarin V., Fusaro A., Mutinelli F., Caffara

- M., Fioravanti M.L.
- O-140 CHARACTERISATION OF A VIRUS ISOLATED FROM FARMED EUROPEAN EEL
ELVERS (*ANGUILLA ANGUILLA*) UNDERGOING A MORTALITY EVENT IN THE
NETHERLANDS
E.S. Munro*, K.J. Stewart, W.J. Murray and O.L.M. Haenen
- O-141 INVESTIGATION ON EARLY PATHOGENESIS OF KOI HERPESVIRUS DISEASE
(KHVD) IN CARP (*CYPRINUS CARPIO* L.)
S.M. Bergmann*, S.J. Monaghan, A. Adams, A. and D. Fichtner
- O-142 A NEW VIRUS CAUSING CARDIOMYOPATHY SYNDROME (CMS) OF ATLANTIC
SALMON
Ø. Haugland*, A.B. Mikalsen*, P. Nilsen, K. Lindmo, B. Thu, T. Eliassen, N. Roos, M.
Rode, Ø. Evensen
- O-143 MOLECULAR CHARACTERIZATION OF EEL HERPESVIRUS ANGUILLID
HERPESVIRUS 1
S.J. van Beurden*, O.L.M. Haenen, B.P.H. Peeters, P.J.M. Rottier and M.Y. Engelsma

15:30-17:15 Diseases of tuna and wild fish

ROOM NAME

- O-144 *CARDICOLA FORSTERI* A PATHOGEN OF SOUTHERN BLUEFIN TUNA
B. Nowak*, T. Cribb, R. Adlard, C. Hayward, N. Bott, D. Ellis and D. Evans
- O-145 ANTIBODY RESPONSE IN RANCHED SOUTHERN BLUEFIN TUNA, *THUNNUS*
MACCOYII, NATURALLY INFECTED WITH THE BLOOD FLUKE, *CARDICOLA*
FORSTERI
NT Kirchhoff*, MJ Leef, V Valdenegro, C Hayward, and BF Nowak
- O-146 WHERE REARED TUNA LOOS THEIR PARASITES?
I. Mladineo*, T. Šegvić and M. Petrić
- O-147 PARASITIC DISEASES OF CULTURED PACIFIC BLUEFIN TUNA, *THUNNUS*
ORIENTALIS.
S. Shirakashi*, M. Andrews, Y. Kishimoto, K. Ishimaru, T. Okada, O. Murata and K. Ogawa
- O-148 NEOEMERGENCE OF *PERKINSUS OLSENI* IN SOUTH AUSTRALIA
M.R. Deveney*, S. Mayfield and S. Bastianello
- O-149 PISCINE REOVIRUS (PRV) IN WILD ATLANTIC SALMON, *Salmo salar* L. AND SEA
TROUT, *Salmo trutta* IN NORWAY
A.H. Garseth*, M. Opheim, C. Fritsvold, E. Skjerve, E. Biering
- O-150 METAZOAN PARASITE COMMUNITIES OF EUROPEAN EEL *ANGUILLA ANGUILLA*
L. FROM KÖYCEĞİZ-DALYAN ESTUARIN CHANNEL SYSTEM, TURKEY
S. Özesen Çolak*, E. Soylu, F. Erdoğan and M. Erdoğan