



## Program

of the 6th International young scientists conference  
(School and workshop)

“Water resources: research and management”

Petrozavodsk, September 1-5, 2020



## Программа

VI Международной конференции молодых ученых  
(школы-практики)

«Водные ресурсы: изучение и управление»

1-5 сентября 2020 г., г. Петрозаводск

The conference is held with the financial support of the RFFR, project № 20-05-22014

## ORGANIZING COMMITTEE:

### Chairman

**Corresponding Fellow of the Russian Academy of Sciences N.N. Filatov,**  
Northern Water Problems Institute (Petrozavodsk)

### Chairman's assistance group for communications with young scientists

**Alexey Tolstikov, PhD,** Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**Nataliya Galakhina, PhD,** Northern Water Problems Institute KarRC RAS (Petrozavodsk)

### Program committee

**Corresponding Fellow of the Russian Academy of Sciences N.N. Filatov,** Northern Water Problems Institute (Petrozavodsk)

**Corresponding Fellow of the Russian Academy of Sciences Sergey Konovalov,** Marine Hydrophysics Institute of the Russian Academy of Sciences (Sevastopol)

**Corresponding Fellow of the Academy of Sciences of the Republic of Tajikistan I. Sh. Normatov,** Tajik National University

**PhD Regerand T.I.** Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**PhD Nazarova L.E.** Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**PhD Ryzhakov A.V.** Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**DSc Kalinkina N.M.** Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**PhD Terzhevnik A.Yu.** Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**Prof. Zyryanov V., DSc** Water Problems Institute of the RAS (Moscow)

**PhD Chebanova M.K.** Water Problems Institute of the RAS (Moscow)

**DSc Zimin A.V.,** Shirshov Institute of Oceanology RAS

**DSc Frumin G.T.** St. Petersburg State University

**DSc Rybalko A.E.,** St. Petersburg State University

**PhD Podrezova N.A.** Russian State Hydrometeorological University

**DSc Pozdnyakov D.V.,** Nansen International Center for Environment and Remote Sensing

**PhD Bashmachnikov I.L.,** Nansen International Center for Environment and Remote Sensing

**DSc Shagidullin R.,** Institute of Ecology and Subsoil Use of the Republic of Tatarstan Academy of Sciences (Kazan)

**PhD Ivanov D.V.** Institute of Ecology and Subsoil Use of the Republic of Tatarstan Academy of Sciences (Kazan)

**PhD Belicheva L.A.,** Russian Research Institute of Fisheries and Oceanography, Karelian branch

**Prof. Läppenranta Matti** University of Helsinki, Finland

**Prof. LI Zhijun** Dalian University of Technology, China

**Assoc. Prof., Dr. Huang Wenfeng** Chang'an University, China

### Organizing committee

**PhD Baklagin V.N.,** Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**PhD. Georgiev A.P.,** Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**PhD Zdorovrnova G.E.,** Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**PhD Zobkov M.B.,** Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**PhD Sidorova A.I.,** Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**PhD Potakhin M.S.,** Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**PhD Myasnikova N.F.,** Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**Dmitrieva Yu.F., Zobkova M.V., Efremova T.A., Ikko O.I., Kravchenko I.Yu., Makarova E.M.,**

**Fomina Yu.Yu., Fedorova V.S.,** Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**Place of venue:** Petrozavodsk, Republic of Karelia (Pushkinskaya, 11, A. Nevskogo, 50)

**E-mail:** [confwrrm2020@yandex.ru](mailto:confwrrm2020@yandex.ru)

September 1<sup>st</sup>

9.00-9.30 – registration (Pushkinskaya, 11)

9.30 – conference opening

### *Plenary section*

**Place of venue:** Petrozavodsk, Republic of Karelia (Pushkinskaya, 11)

**Chair:** Corresponding Fellow of the Russian Academy of Sciences N.N. Filatov,  
Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**Co-chair:** Alexey Tolstikov, PhD Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**9.30-9.50 – Corresponding Fellow of the Russian Academy of Sciences N.N. Filatov, ON SOME MODERN PROBLEMS OF RATIONAL USE WATER RESOURCES** (Northern Water Problems Institute KarRC RAS, Petrozavodsk)

**9.50-10.10 – Corresponding Fellow of the Academy of Sciences of the Republic of Tajikistan I. Sh. Normatov, TRANSBOUNDARY RIVERS OF CENTRAL ASIA AND THE STATE OF WATER RESOURCES IN THE REGION** (Tajik National University)

**10.10-10.30 – DSc Grigory Frumin ENVIRONMENTAL PROBLEMS OF TRANSBOUNDARY WATER OBJECTS** (St. Petersburg State University)

**10.30-10.50 – professor Leppärantä Matti ON ICE CLIMATOLOGY OF EURASIAN LAKES** (University of Helsinki, Finland)

**10.50-11.10 – professor Zhijun Li ICE SURFACE ALBEDO RESULTS FROM CHINESE WULIANGSU LAKE OBSERVATIONS** (Dalian University of Technology, China)

### *11.10-11.30– Coffee break*

**11.30-11.50 – Prof. Zyryanov V., DSc ICE AND UNDER ICE PROCESSES** (Water Problems Institute of the RAS , Moscow)

**11.50-12.10 – DSc E. V. Venitsianov TOPICAL PROBLEMS OF WATER QUALITY MANAGEMENT** Water Problems Institute of the Russian Academy of Sciences, Moscow

**12.10-12.30 – PhD Ivanov D.V. REGIONAL STANDARDS FOR THE CONTENT OF POLLUTANTS IN BOTTOM SEDIMENTS AND THEIR PLACE IN THE SYSTEM OF ENVIRONMENTAL QUALITY STANDARDS IN THE RUSSIAN FEDERATION** (Institute of Ecology and Subsoil Use of the Republic of Tatarstan Academy of Sciences (Kazan)

**12.30-12.50 – DSc Rybalko A.E., THE MAIN STAGES OF THE FORMATION OF THE COVER OF QUATERNARY SEDIMENTS IN LADOGA AND ONEGA LAKES IN THE LATE NEOPLEISTOCENE-HOLOCENE** (St. Petersburg State University)

**12.50-13.10 – PhD N.A.Belkina STUDY OF THE MODERN SEDIMENTATION REGIME IN LAKES OF THE HUMID ZONE (EXAMPLE OF KARELIA)** *Northern Water Problems Institute, Karelian Research Centre RAS*

**13.10-13.30 – PhD Sharov A.N. ECOLOGY OF PHYTOPLANKTON OF NORTHERN WATER BODIES** (IBIW. Borok)

**13.30-13.50 – Prof. Vapirov V.V.DSc BIOGENIC ELEMENTS IN AQUATIC ECOSYSTEMS AND THEIR PHYSIOLOGICAL ROLE** (Petrozavodsk State University)

### *13.50-15.00 – lunch*

### *Section works*

#### *Section 1. Hydrophysics*

**Place of venue:** Petrozavodsk, Republic of Karelia (Pushkinskaya, 11)

**Chair:** PhD Chebanova M.K. Water Problems Institute of the RAS (Moscow)

**Deputy chair:** PhD Podrezova N.A. Russian State Hydrometeorological University (St. Petersburg)

**Scientific expert:** – Prof. Zyryanov V., DSc Water Problems Institute of the RAS (Moscow)

**15.00-15.15 – T.Ya. Shul'ga, O.V. Matuzaeva PREDICTIVE SIMULATION OF THE DURATION OF WIND-INDUCED FLOODING/DRYING OF THE SEA OF AZOV COAST** <sup>1</sup>Marine Hydrophysical Institute RAS, Sevastopol, Russia, <sup>2</sup>Sevastopol State University, Sevastopol, Russia

**15.15-15.30 – R.E. Zdorovenov<sup>1</sup>, G.E. Zdorovenova<sup>1</sup>, A. Guzeva<sup>2,3</sup>, S.Evgrafova<sup>4</sup>, A.A. Shadrina<sup>3</sup>, S.D. Golosov<sup>2</sup>, I.S. Zverev<sup>2</sup>, I.V. Fyodorova<sup>3</sup> THERMAL AND ICE CONDITIONS OF ARCTIC LAKES IN THE CONTEXT OF REGIONAL CLIMATE VARIABILITY**<sup>1</sup>*Northern Water Problems Institute, Karelian Research Center RAS, Petrozavodsk, Russia,* <sup>2</sup> *Institute of Limnology RAS, St. Petersburg, Russia,* <sup>3</sup> *St. Petersburg State University, St. Petersburg, Russia,* <sup>4</sup> *Institute of Limnology RAS, St. Petersburg, Russia*

**15.30-15.45 – E. E.Kruglova,O. S.Mekhova ANALYSIS OF ANTARCTIC CIRCUMPOLAR ICE MAPS** *Russian State Hydrometeorological University*

**15.45-16.00– G.E. Zdorovenova<sup>1</sup>, I.V. Fyodorova<sup>2</sup>, A.A. Shadrina<sup>2</sup>, G.G. Gavrilenko<sup>1</sup>, S.R. Bogdanov<sup>1</sup>, T.V. Efremova<sup>1</sup>, A.Y. Terzhevik<sup>1</sup>, R.E. Zdorovenov<sup>1</sup>, N.I. Palshin<sup>1</sup>DISSOLVED OXYGEN IN ICE-COVERED LAKES: SEASONAL AND HIGH FREQUENCY VARIATIONS** <sup>1</sup>*Northern Water Problems Institute, Karelian Research Center RAS, Petrozavodsk, Russia,* <sup>2</sup> *St.Petersburg State University, St. Petersburg, Russia,*

**16.00-16.15 – G.G. Gavrilenko, A.Yu. Terzhevik, G.E. Zdorovenova, R.E. Zdorovenov,N.I. Palshin, T.V. Efremova, S.R. Bogdanov THE ICE-OFF CONDITIONS AND SPRING MIXING PROPERTIES IN A SHALLOW BOREAL LAKE** *Northern Water Problems Institute, Karelian Research Centre RAS, Petrozavodsk, Russia*

**16.15-16.30 – Bogdanov S.R., Borodin A.V. GENERATION MECHANISM AND PARAMETERS OF SHORT INTERNAL WAVES IN AN ICE-COVERED SHALLOW BOREAL LAKE** *Northern Water Problems Institute, Karelian Research Centre RAS, Petrozavodsk, Russia*

**16.30-16.45– Gnatyuk N.V. ABILITY ASSESSMENT OF THE REGIONAL CLIMATE MODELS REMO AND ALARO TO REPRODUCE AIR TEMPERATURE AND PRECIPITATION VOLUMES FOR THE BASINS OF THE LARGEST RIVERS IN RUSSIA** *Nansen International Center for Environment and Remote Sensing*

**16.45-17.00 Xiaowei Cao<sup>1</sup>, Peng Lu<sup>1</sup>, Matti Leppäranta<sup>2</sup>, Lauri Arvola<sup>3</sup>, Jussi Huotari<sup>3</sup>, Xiaohong Shi<sup>4</sup>, Guoyu Li<sup>5</sup>, Zhijun Li<sup>1</sup> SOLAR RADIATION TRANSFER FOR AN ICE-COVERED LAKE IN THE CENTRAL ASIAN ARID CLIMATE ZONE** <sup>1</sup> *State Key Laboratory of Coastal and Offshore Engineering, Dalian University of Technology, China,* <sup>2</sup>*Institute of Atmospheric and Earth Sciences, University of Helsinki, Helsinki, Finland,* <sup>3</sup>*Faculty of Biological and Environmental Sciences, Ecosystems and Environment Research Programme, Lammi Biological Station, University of Helsinki, Lammi, Finland,*<sup>4</sup>*Water Conservancy and Civil Engineering College, Inner Mongolia Agricultural University, Hohhot, China,* <sup>5</sup>*State Key Laboratory of Frozen Soil Engineering, Cold and Arid Regions Environmental and Engineering Research Institute, Chinese Academy of Sciences, Lanzhou, China (video)*

## **Section 2. Hydrochemistry**

**Place of venue:** Petrozavodsk, Republic of Karelia (A. Nevskogo, 50)

**Chair:** PhD Zobkov M.B., Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**Deputy chair:** PhD Galakhina N.E., Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**Scientific expert:** – Prof. DSc Frumin G.T St. Petersburg State University

**15.00-15.15 – G.T. Frumin, Chen Jenlin, V.V. Drozdov ASSESSMENT OF THE ENVIRONMENTAL STATUS OF LAKES DONCHANG AND DAMING UNDER ANTHROPOGENIC IMPACT FROM INDUSTRIAL AREAS OF NORTH-EAST CHINA** *Russian State Hydrometeorological University, St. Petersburg*

**15.15-15.30 – M.V. Zobkova, N.E. Galakhina, T.A. Efremova, M.B. Zobkov A TECHNIQUE FOR MICROPLASTICS CONTENT DETERMINATION IN INLAND WATER SEDIMENTS** *Northern Water Problems Institute, Karelian Research Centre RAS, Petrozavodsk, Russia*



**15.30-15.45 – N.V.Nikerina<sup>1,2</sup>, O.V. Zadonskaya<sup>1</sup> ESTIMATION OF NATURAL BACKGROUND CONCENTRATIONS IN THE NARVA RIVER SOURCE AND MOUTH** <sup>1</sup>State Hydrological Institute, St. Petersburg, Russia, <sup>2</sup>St. Petersburg State University, St. Petersburg, Russia

**15.45-16.00 - M.A.Postevaya<sup>1,2</sup>, Z.I.Slukovskii<sup>1,3</sup>, V.A.Dauvalter<sup>1</sup> SEASONAL VARIATIONS OF HYDROCHEMICAL PARAMETERS IN LAKE SEMENOVSKOYE (CITY OF MURMANSK) IN 2019** <sup>1</sup>Institute of North Industrial Ecology Problems, Kola Science Centre RAS, Apatity, <sup>2</sup> Murmansk Arctic State University, Murmansk, <sup>3</sup>Institute of Geology, Karelian Research Centre RAS, Petrozavodsk

**16.00-16.15 – K. V. Bepalova FORMATION AND QUALITY OF WATER RESOURCES OF THE BOLSHOY KINEL RIVER** *Institute of the Volga Basin Ecology RAS - branch of Samara Federal Research Centre RAS*

**16.15-16.30 – M.A. Makarova, V.A. Shelutko ASSESSMENT OF URBAN IMPACT ON THE FORMATION OF THE NUTRIENT FLOW IN THE VELIKAYA RIVER** *Russian State Hydrometeorological University*

**17.00 – Excursion to the Geological Museum (Pushkinskaya st., 11)**

September 2<sup>st</sup>

### *Sections work*

#### **Section 3. Geography and Hydrology**

**Place of venue:** Petrozavodsk, Republic of Karelia (Pushkinskaya, 11)

**Chair:** PhD Tolstikov A.V., Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**Deputy chair:** PhD Baklagin V.N. Northern Water Problems Institute KarRC RAS  
(Petrozavodsk)

**Scientific expert:** – Corresponding Fellow of the Russian Academy of Sciences N.N. Filatov,  
Northern Water Problems Institute

**10.00-10.15 – I.A. Chernov<sup>1</sup>, A.V. Tolstikov<sup>2</sup>, N.G. Iakovlev<sup>3</sup> NUMERICAL SIMULATION OF BIOGEOCHEMICAL PROCESSES IN THE WHITE SEA, INCLUDING THE SEA-ICE ECOSYSTEM** <sup>1</sup>*Institute of Applied Mathematical Research, Karelian Research Centre RAS, Petrozavodsk, Russia* <sup>2</sup>*Northern Water Problems Institute, Karelian Research Centre RAS, Petrozavodsk, Russia* <sup>3</sup>*Institute of Numerical Mathematics of RAS, Moscow, Russia*

**10.15-10.30 – N.G. Iakovlev<sup>1</sup>, I.A. Chernov<sup>2</sup> A NEW INTEGRATED MODEL OF THE ARCTIC OCEAN AND SEA ICE** <sup>1</sup>*Institute of Numerical Mathematics of RAS, Moscow, Russia*, <sup>2</sup>*Institute of Applied Mathematical Research, Karelian Research Centre RAS, Petrozavodsk, Russia*

**10.30-10.45 – Lomov V.A. RESEARCH ON METHANE EMISSIONS FROM A VALLEY-BASED STORAGE RESERVOIR BY MATHEMATICAL MODELING METHODS** *Lomonosov Moscow State University*

**10.45-11.00 – E.V. Davydenko CALCULATION OF MAXIMUM WATER LEVELS OF UNEXPLORED LAKES: LAKES OF NORTH-WEST RUSSIA AS AN EXAMPLE** *Russian State Hydrometeorological University, St. Petersburg*

**11.00-11.15 N. Yu. Korneenkova ASSESSMENT OF THE LONG-TERM DYNAMICS OF THE LAKE AREAS IN THE SOUTH OF WESTERN SIBERIA USING SATELLITE IMAGES** *Institute of Limnology of the Russian Academy of Sciences*

**11.15-11.30– N. Panova<sup>1</sup>, E. Voyakina<sup>1,2</sup> RESEARCH INTO THE LIMNOLOGICAL PARAMETERS OF LAKE SISJARVI (VALAAM ARCHIPELAGO, LAKE LADOGA)** <sup>1</sup>*Russian State Hydrometeorological University* <sup>2</sup>*Saint-Petersburg Scientific Research Centre for Ecological Safety RAS*

**11.30-11.45– A K.D. Odinokova, E.A. Primak ASSESSMENT OF THE RESISTANCE OF TRANSFORMED WATER BODIES IN KARELIA WITH ALLOWANCES FOR NON-LINEARITY** *Russian State Hydrometeorological University, St. Petersburg*

**11.45-12.00– E. Chekmareva LIMITATION OF RECREATIONAL WATER USE OF LAKES IN NORTH-WESTERN TVER REGION** *Ivankovskaya Research Station, Branch of the Water Problems Institute of the Russian Academy of Sciences*

#### **Section 4. Bottom sediments of continental water bodies**

**Place of venue:** Petrozavodsk, Republic of Karelia (A. Nevskogo, 50)  
**Chair:** PhD Slukovskii Z.I. Institute of Geology KarRC RAS (Petrozavodsk)  
**Deputy chair:** PhD Potakhin M.S., Northern Water Problems Institute KarRC RAS  
(Petrozavodsk)  
**Scientific expert:** – Prof. DSc Rybalko A.E., St. Petersburg State University

**10.00-10.15 – P.A. Ryazantsev** POSSIBILITIES AND TASKS FOR GROUND PENETRATING RADAR APPLICATION IN LYMNOLOGICAL STUDIES *Institute of Geology, Karelian Research Centre RAS*

**10.15-10.30 – N.A. Myasnikova** GRAIN-SIZE ANALYSIS OF BOTTOM SEDIMENTS IN LAKE TOROSJARVI *Northern Water Problems Institute, Karelian Research Centre RAS*

**10.30-10.45 – A.V. Maslennikova<sup>1,2</sup>, V.O.Gulakov<sup>1</sup>** LAKE TURGOYAK DIATOM ASSEMBLAGES CHANGES IN RESPONSE TO HUMAN IMPACT <sup>1</sup>*South Urals Research Center of Mineralogy and Geoecology, UralBranch RAS,* <sup>2</sup>*South Ural State University*

**10.45-11.00 – Z.I. Slukovskii<sup>1, 2</sup>, M.A. Medvedev<sup>2</sup>, V.A. Grigoriev<sup>3</sup>, A.S. Mitsukov<sup>1</sup>** GEOCHEMISTRY OF RECENT SEDIMENTS IN SMALL LAKES IN BACKGROUND AREAS OF THE RUSSIAN ARCTIC ZONE IN THE REPUBLIC OF KARELIA AND MURMANSK REGION <sup>1</sup> *Institute of North Industrial Ecology Problems, Kola Science Centre RAS,* <sup>2</sup> *Institute of Geology, Karelian Research Centre RAS,* <sup>3</sup> *Institute of Earth Sciences of the St. Petersburg State University*

**11.00-11.15 – S.I. Vokueva, D.B. Denisov,** USING DIATOM ASSEMBLAGES IN SEDIMENTS TO ASSESS THE STATE OF AQUATIC ECOSYSTEMS IN THE URBAN IMPACT ZONE *Institute of North Industrial Ecology Problems, Kola Science Center RAS*

**11.15-11.30 – M.S. Potakhin** A MORPHOGENETIC CLASSIFICATION OF WATERBODIES IN THE LAKE ONEGO CATCHMENT AREA (REPUBLIC OF KARELIA) *Northern Water Problem Institute, Karelian Research Center RAS*

### **Section 5. Hydrobiology**

**Place of venue:** Petrozavodsk, Republic of Karelia (A. Nevskogo, 50)

**Chair:** PhD Belicheva L.A., Russian Research Institute of Fisheries and Oceanography, Karelian branch

**Deputy chair:** PhD Sidorova A.I., Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**Scientific expert:** – DSc Kalinkina N.M. Northern Water Problems Institute KarRC RAS  
(Petrozavodsk)

**14.00-14.15 – N.V. Zuyeva<sup>1</sup>, O.G. Grishutkin<sup>2</sup>, Yu.A. Zuyev<sup>3</sup>, D.Yu. Efimov<sup>2</sup>, A.A. Bobrov<sup>2</sup>** ASSESSMENT OF THE ECOLOGICAL STATE OF THE PAZ RIVER SYSTEM BY HYDROBOTANICAL INDICATORS <sup>1</sup> *Russian State Hydrometeorological University,* <sup>2</sup> *Papanin Institute for Biology of Inland Waters RAS,* <sup>3</sup> *St. Petersburg Branch of VNIRO (GosNIORKH named after L.S. Berg)*

**14.15-14.30 – Yu. Yu. Fomina** PHENOLOGICAL PHASES OF ZOOPLANKTON IN PETROZAVODSK BAY OF LAKE ONEGO *Northern Water Problems Institute, Karelian Research Centre RAS*

**14.30-14.45 - I. Mukhin** BRYOZOANS OF STONY LITTORAL SANDY BEACHES OF LAKE LADOGA SKERRIED REGION *Vologda State University*

**14.45-15.00– Petukhova M.D.<sup>1</sup>, Starukhina A.D.<sup>2</sup>, Mukhin I.A.<sup>1</sup>, Dudakova D.S.<sup>3</sup>** FACTORS FOR THE SPATIAL STRUCTURE OF THE *ASELLUS AQUATICUS* (CRUSTACEA, ISOPODA) POPULATION IN THE ROCKY LITTORAL ZONE OF LAKE LADOGA<sup>1</sup> *Vologda State University,*<sup>2</sup> *St. Petersburg State University,*<sup>3</sup> *Institute of Limnology RAS*

**15.00-15.15 – Rodionova N.V.<sup>1</sup>, Starukhina A.D.<sup>2</sup>, Dudakova D.S.<sup>1</sup>** A STUDY OF ZOOPLANKTON DIEL MIGRATIONS IN THE SKERRIED REGION OF LAKE LADOGA<sup>1</sup> *Institute of Limnology RAS,*<sup>2</sup> *St. Petersburg State University*

**15.15-15.30 – V. Fyodorova** AUTUMN ALGAL BLOOM IN LAKE SVYATZERO IN 2019 *Northern Water Problems Institute, Karelian Research Center RAS*

### **15.30-15.45– Coffee break**

**15.45-16.00– N.Yu. Sukhovilo, A.A. Kuksovsky, D.B. Vlasova ALTERATION OF THE HIGHER AQUATIC VEGETATION IN WATERS OF THE BRASLAV LAKES NATIONAL PARK UNDER CHANGES IN THE NATURAL ENVIRONMENT AND PROTECTION REGULATIONS** *Belarusian State University*

**16.00-16.15 – V.O. Sergeeva<sup>1</sup>, E.Yu. Voyakina<sup>1,2</sup> ASSESSMENT OF THE TROPHIC STATUS OF LAKES IN VALAAM ARCHIPELAGO** <sup>1</sup>*Russian State Hydrometeorological University, Saint Petersburg Scientific Research Centre for Ecological Safety RAS*

**16.15-16.30– Makarova E.M. BIOINDICATION OF ECOSYSTEMS' CONDITION IN THE URBANIZED RIVERS BY MICROBIOLOGICAL INDICATORS** (*Northern Water Problems Institute, Karelian Research Centre RAS*)

September 2<sup>nd</sup>

### **16.30-17.00 –Poster section**

discussion of poster presentations, including presented on the conference web-site  
<http://water.krc.karelia.ru/section.php?plang=r&id=3655>

**Place of venue:** Petrozavodsk, Republic of Karelia (Pushkinskaya, 11)

**Chair:** Corresponding Fellow of the Russian Academy of Sciences N.N. Filatov,  
Northern Water Problems Institute KarRC RAS (Petrozavodsk)

**Co-chair:** PhD Regerand T.I., Northern Water Problems Institute KarRC RAS (Petrozavodsk)

- **E.V. Gatal'skaya, N.A. Belkina PHOSPHORUS IN BOTTOM SEDIMENTS IN IVANKOVSKOYE STORAGE RESERVOIR** *Northern Water Problems Institute, Karelian Research Centre RAS*
- **A.O. Lantushenko<sup>1</sup>, Ya.V. Meger, E.S. Kladchenko<sup>2</sup>, A.Yu. Andreyeva<sup>2</sup> ANTIOXIDANT STATUS OF CELLS IN MUSSEL GILL TISSUE UNDER SHORT-TERM HYPOXIA** <sup>1</sup>*Sevastopol State University, 2A.O. Kovalevsky Institute of Biology of the Southern Seas RAS*
- **I.V. Morozova<sup>1</sup>, N.A. Belkina<sup>1</sup>, M.S. Potakhin<sup>1</sup>, Z.I. Slukovskii<sup>2</sup> METHANE IN BOTTOM SEDIMENTS OF VYGOZERSKOYE STORAGE RESERVOIR** <sup>1</sup>*Northern Water Problems Institute, Karelian Research Centre RAS, 2Institute of Geology, Karelian Research Centre RAS*
- **E.S. Pimeenko, A.V. Cherevichko CHANGES IN THE GROWTH RATE OF EARLY-AGE PERCH (*PERCA FLUVIATILIS* L.) IN LAKE PEIPUS** *Pskov Branch of the Russian Federal Research Institute of Fisheries and Oceanography*
- **K.V. Titova, N.M. Kokryatskaya, T. A. Zhibareva SULFATE REDUCTION IN BOTTOM SEDIMENTS IN THE SYSTEM OF LAKES IN SOUTHERN ARKHANGELSK REGION** *N. Laverov Federal Center for Integrated Arctic Research RAS*
- **S Yu. Yu. Fomina TATE OF THE KONDOPOZHISKY BAY (LAKE ONEGO) ECOSYSTEM IN THE AREA HOLDING TROUT FARMS, ASSESSED USING ZOOPLANKTON AS INDICATORS** *Northern Water Problems Institute, Karelian Research Centre RAS*
- **A.N. Chernyshev ZOOPLANKTON TROPHIC STRUCTURE IN LAKE LESHCHOVOYE (VALAAM ISLAND, LAKE LADOGA)** *Russian State Hydrometeorological University*
- **Wenfeng Huang UNDER-ICE DISSOLVED OXYGEN AND METABOLISM DYNAMICS IN A SHALLOW LAKE OF ARID CLIMATE** *Chang'an University, China*
- **SUN Xin, LI Xing\* PHYTOPLANKTON COMMUNITY STRUCTURE CHARACTERISTICS AND ITS INFLUENCING FACTORS BEFORE AND AFTER FREEZING AND THAWING IN WULIANGSUHAI LAKE** *College of Chemistry and Environmental Science, Inner Mongolia Normal University, China*
- **Yaodan Zhang<sup>1</sup>, Zhijun Li<sup>1</sup>, Chunjiang Li<sup>1</sup>, Baosen. Zhang<sup>1</sup>, Yu. Deng<sup>1</sup> RESEARCH ON MICROSTRUCTURE CHARACTERISTICS OF RIVER ICE IN INNER MONGOLIA SECTION OF THE YELLOW RIVER AND ITS INFLUENCING FACTORS** (<sup>1</sup> *State Key Laboratory of*

Coastal and Offshore Engineering, Dalian University of Technology, China. <sup>2</sup> Yellow River Institute of Hydraulic Research, Zhengzhou, China)

• **YU Miao, LU Peng\*, CAO Xiao-wei, TANG Ming-guang, WANG Qing-kai, LI Zhi-jun** **FIELD OBSERVATIONS OF THE BIDIRECTIONAL REFLECTANCE CHARACTERISTICS OF LAKE ICE** (State Key Laboratory of Coastal and Offshore Engineering, Dalian University of Technology)

• **XIE Fei, LU Peng, CAO Xiao-wei, WANG Qing-kai, LI Zhi-jun** **STUDY ON THE EVOLUTION PROCESS OF LAKE ICE AND RELATED INFLUENCING FACTORS IN NORTHEAST CHINA** (State Key Laboratory of Coastal and Offshore Engineering, Dalian University of Technology)

• **Xiaowei Cao<sup>1</sup>, Peng Lu<sup>1</sup>, Matti Leppäranta<sup>2</sup>, Lauri Arvola<sup>3</sup>, Jussi Huotari<sup>3</sup>, Xiaohong Shi<sup>4</sup>, Guoyu Li<sup>5</sup>, Zhijun Li<sup>1</sup>** **SOLAR RADIATION TRANSFER FOR AN ICE-COVERED LAKE IN THE CENTRAL ASIAN ARID CLIMATE ZONE** <sup>1</sup> State Key Laboratory of Coastal and Offshore Engineering, Dalian University of Technology, China, <sup>2</sup>Institute of Atmospheric and Earth Sciences, University of Helsinki, Helsinki, Finland, <sup>3</sup>Faculty of Biological and Environmental Sciences, Ecosystems and Environment Research Programme, Lammi Biological Station, University of Helsinki, Lammi, Finland, <sup>4</sup>Water Conservancy and Civil Engineering College, Inner Mongolia Agricultural University, Hohhot, China, <sup>5</sup>State Key Laboratory of Frozen Soil Engineering, Cold and Arid Regions Environmental and Engineering Research Institute, Chinese Academy of Sciences, Lanzhou, China

• **Zhijun LI** **COMPARISON AND ANALYSIS ON THE STATISTICAL MODELS FOR THE DIURNAL VARIATIONS OF LAKE ICE ALBEDO UNDER CLEAR SKIES** State Key Laboratory of Coastal and Offshore Engineering, Dalian University of Technology, China

#### 17.00 – SUMMING UP THE CONFERENCE RESULTS

**Place of venue:** Petrozavodsk, Republic of Karelia (Pushkinskaya, 11)

## School and workshop

**3-5.09**

**Place of venue:** Petrozavodsk, Republic of Karelia (A. Nevskogo, 50)