



Integrated Drought Management in Central and Eastern Europe ACTIVITY LIST

1. BASIC INFORMATION

Number of Activity:	1.4	
Title of the activity:	Development of GIS Based Communication Technology Platform for the Sustainable Management of Transboundary Water Resources in Lithuania, Poland and Kaliningrad Region (Russia)	
Duration of the activity:	1 year, 2014	
	Bernardas Paukstys, GWP Lithuania	
	National activitiy Leaders:	
	Tomasz Okruzhko, GWP-Poland	
<u>Activity leader:</u>	Boris Chubarenko, Kaliningrad district	
	Aliaksandr Pakhomau, Central Research Institute for Complex Use of	
	Water Resources, Belarus	
	GWP representatives, responsible for organisation of the project and	
Chairman of the CWP:	dissemination of results:	
	Bernardas Paukstys, GWP-Lithuania	
	Tomasz Okruzhko, GWP-Poland.	

Description of the activity:

The Russian enclave Kaliningrad is located in the Baltic Sea basin. Two major rivers, the Pregola and the Neman, with outlets to the Baltic Sea, pass through the enclave and are heavily affected by industrial and domestic waste water discharge that reaches river water systems almost untreated. Beyond hampering development in Kaliningrad itself the situation also affects progress made by neighboring countries Poland and Lithuania ultimately severely decreasing the opportunities to promote rehabilitation of the Baltic Sea. Global climate change has additional influence on the natural regimes of river basins, lagoons and the Baltic Sea.

In 2012 the Stockholm International Water Institute with its partners GWP-Lithuania and GWP-Poland initiated a 3 year project on "Building a Framework for Collective Action in The Management of the Transboundary Waters in Kaliningrad, Russia; Lithuania, and Poland (Baltic Sea Region)". The overall project objective is to build a partnership to facilitate formal transboundary cooperation and investment for green and smart growth on the shared river basin systems between Kaliningrad Oblast, Russia, Poland, Lithuania and the broader Baltic Sea Community of actors in accordance with EU and Russian regulations and economic strategies. The project also addresses issues of adaptation of the region to the climate change (including drought issues). In 2014 Belarus was invited to become a partner in the project as about 50% of Neman catchment is in Belarus.

A two- year programme on Integrated Drought Management in Central and Eastern Europe has started





in 2013 with participation of GWP-Lithuania and GWP-Poland. Drought risk management is one of the activities of the programme. Effective and adequate collection and processing of the information from the existing large volume of data concerning various natural and human impacted aspects is the primary function for drought risk management.

In order to interconnect all components of both projects development of a cross-cutting web based GIS communication technology platform (GIS-CTP) is needed. A rudimentary analytical system will support all project components underpinned with Water Framework Directive (for Lithuania and Poland) and Kaliningrad Oblast and Belarus datasets where available. The system will be based on spatial analysis through Geographic Information System (GIS) applications.

2. CONTRIBUTING ORGANIZATIONS / EXPERTS

Country	Organization	Contact
Poland	GWP-Poland	Tomasz Okruzhko,
rolaliu	GWF-Foland	T.Okruszko@levis.sggw.pl
Lithuania	GWP-Lithuania	Bernardas Paukstys, <u>bernardas@iti.lt</u>
Russia	Atlantic Branch of P.P.Shirshov Institute of	Boris Chubarenko, <u>chuboris@mail.ru</u>
Russia	Oceanology, Russian Academy of Sciences	
Belarus	Central Research Institute for Complex Use of	Aliaksandr Pakhomau,
Delarus	Water Resources, Belarus	aliaksandr.pakhomau@cricuwr.by

^{*} Experts of Atlantic Branch of P.P.Shirshov Institute of Oceanology, Russian Academy of Sciences and Central Research Institute for Complex Use of Water Resources, Belarus will be sub-contracted by the GWP-Lithuani





3. PLAN for IMPLEMENTATION of the activity

Name of the Output 1	Kick-off workshop for the database and GIS experts from the	
	project countries (Lithuania, Poland, Kaliningrad and Belarus)	
Type of the output (analysis, report,	Workshop	
guideline, workshop, brochure,		
etc.):		
Form (website, CD, printed,	One printed report on the results of the workshop. Information to	
database, audio-visual, computer	the project participants and stakeholders will be distributed	
software, etc.):	electronically	
Purpose of the output:	To meet and discuss details of the project: responsibilities,	
	outputs, timetable, budget, etc.	
Structure and description	The workshop will be held in Lithuania or Poland.	
(contents, requirements for use,		
chapters, etc.)		

Name of the Output 2	Concluding workshop for the database and GIS experts from the	
	project countries (Lithuania, Poland, Kaliningrad and Belarus)	
Type of the output (analysis, report,	Workshop	
guideline, workshop, brochure,		
etc.):		
Form (website, CD, printed,	One printed report on the results of the workshop. Information on	
database, audio-visual, computer	the project will be presented at the websites of project partners	
software, etc.):	and distributed electronically to the project participants and	
	stakeholders	
Purpose of the output:	To meet and discuss project results and further steps	
Structure and description	The workshop will be held in Kaliningrad, Lithuania or Poland.	
(contents, requirements for use,		
chapters, etc.)		

Name of the Output 3	Procurement of GIS software	
Form (website, CD, printed,	Software	
database, audio-visual, computer		
software, etc.):		
Purpose of the output:	GIS Software is the instrument for further implementation of the	
	project	
Structure and description	Latest version of ArcGIS software with possibilities to update will	
(contents, requirements for use,	be purchased. GIS consultancy services will be sub-contracted to	
chapters, etc.)	the project participants.	





Name of the Output 4	Development of GIS communication technology platform (GIS-		
	CTP)		
Type of the output (analysis, report,	Database and GIS visualization of the transboundary and climatic		
guideline, workshop, brochure,	clusters		
etc.):			
Form (website, CD, printed,	Website and CD		
database, audio-visual, computer			
software, etc.):			
Purpose of the output:	Web based database will be created to provide equal possibilities		
	for the countries and project partners dealing with transboundary		
	and climatic issues to input data and access to information. A web-		
	based, GIS information system will enable the information to be		
	shared efficiently by project partners and stakeholders:		
	governments, NGOs, the media, and other interested parties in		
	and outside the basin. The creation of online databases will enable		
	a knowledge based community to emerge, building on the		
	collective expertise in the basins.		
Structure and description	A rudimentary analytical system will support all project		
(contents, requirements for use,	components underpinned with Water Framework Directive (for		
chapters, etc.)	Lithuania and Poland) and Kaliningrad Oblast and Belarus datasets		
	where available. The system will be based on spatial analysis		
	through Geographic Information System (GIS) applications.		

Steps for implementation of the activity	Till when?	Who is responsible?
Kick-off Workshop	July 2014	Bernardas Paukstys, GWP-Lithuania
		Tomasz Okruzhko, GWP-Poland
Concluding workshop	November 2014	Bernardas Paukstys, GWP-Lithuania
		Tomasz Okruzhko, GWP-Poland
Procurement of GIS support (software	September 2014	Porpardas Paukstys GWD Lithuania
and consultancy services)		Bernardas Paukstys, GWP-Lithuania
FINAL OUTPUT: Development of GIS		
communication technology platform	November 2014	Bernardas Paukstys, GWP-Lithuania
(Database and GIS visualization of the		Tomasz Okruzhko, GWP-Poland
transboundary and climatic clusters)		