

## Message from the Chair of WGEA



Dear Colleagues,

I am pleased to announce that we have completed all the activities and projects in the WGEA 2014-2016 workplan. All seven research projects, the update of the WGEA guidance on waste management, and the review of four International Standards of Supreme Audit Institutions (ISSAIs) on environmental auditing (ISSAIs 5110, 5120, 5130, and 5140) have concluded. We have also carried out various other activities, including Global Training Facility courses at the International Centre for Environment Audit and Sustainable Development in India, a forestry audit training in Indonesia, the publication of the Greenlines newsletter, and various regional WGEA activities. In addition, we have enhanced our cooperation with other international organizations, including the United Nations Environment Programme, United Nations Framework Convention on Climate Change (UNFCCC), and the Convention on Biological Diversity (CBD). I would like to convey my sincere thanks to everyone who contributed to the activities and projects in this workplan, especially the project leaders and subcommittee members who put tremendous effort into finalizing these projects.

On this occasion, I would also like to bring to your attention the upcoming 17th INTOSAI WGEA Assembly, which will be held 24-27 October 2016 in Jakarta, Indonesia. This is an important event for INTOSAI WGEA as the finalized projects of the current workplan will be presented to allow attending SAIs to better understand these projects. We will also discuss the WGEA 2017-2019 workplan at this meeting, which could include topics such as Sustainable Development Goals; climate change; environmental health, particularly air pollution; and biodiversity. I encourage all SAIs to attend this event to share and enrich their own experiences as well as those of other attendees.

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## Feature Story

The United Nations' 2030 Agenda for Sustainable Development contains 17 development goals and 169 associated targets to guide global policy on a wide range of issues, including environmental and natural resource issues. To achieve these goals, member nations will need to implement effective policies and programs. While this may be challenging for many nations, it is also a time of immense opportunity. Nations can benefit from their experiences and the experiences of other countries through the operation of a vast number of Multilateral Environmental Agreements (MEAs). MEAs play a critical role in the overall framework of environmental laws and conventions. They complement national legislation and bilateral or regional agreements and form the overarching international legal basis for global efforts to address particular environmental issues. At the same time, SAIs can provide a valuable service by serving as an independent observer and developing recommendations for improvements to programs and operations to help ensure that goals and targets are achieved.

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## Feature Story

*The United Nations' 2030 Agenda for Sustainable Development contains 17 development goals and 169 associated targets to guide global policy on a wide range of issues, including environmental and natural resource issues. To achieve these goals, member nations will need to implement effective policies and programs. While this may be challenging for many nations, it is also a time of immense opportunity. Nations can benefit from their experiences and the experiences of other countries through the operation of a vast number of Multilateral Environmental Agreements (MEAs). MEAs play a critical role in the overall framework of environmental laws and conventions. They complement national legislation and bilateral or regional agreements and form the over-arching international legal basis for global efforts to address particular environmental issues. At the same time, SAIs can provide a valuable service by serving as an independent observer and developing recommendations for improvements to programs and operations to help ensure that goals and targets are achieved.*



### **The Mutually Supportive Role of the Goals of the United Nations' 2030 Agenda for Sustainable Development, Multilateral Environmental Agreements, and the SAIs**

In September 2015, the United Nations held its Sustainable Development Summit, where world leaders adopted the 2030 Agenda for Sustainable Development. The Agenda includes 17 Sustainable Development Goals (SDGs) and commits member states to “[work] tirelessly for the full implementation of this Agenda by 2030.” These 17 SDGs and the associated 169 targets are to guide global policy on a wide range of issues, including poverty, health, food and agriculture, water and sanitation, human settlements, energy, climate change, sustainable consumption and production, oceans, and terrestrial ecosystems. More than half the SDGs have an environmental focus, and more than half of the targets concern the environment directly—including at least one in each of the SDGs. On 11 March 2016, the United Nations Statistical Commission’s Interagency and Expert Group on SDG Indicators agreed on 230 individual indicators to monitor implementation, measure attainment, and review progress of the SDGs.

The next step requires approaches that will allow member states, parties to MEAs, UN agencies, and other stakeholders to further integrate themselves into the implementation process and align their goals and objectives with the 2030 Agenda. This step will include a critical look at the value-added roles of existing long-term strategies, mid-term action plans, short-term programmes of work, and initiatives and projects, as well as an examination of their mutually beneficial interaction and inter-connectedness at global, regional, sub-regional, and national levels. Parties to MEAs can contribute to this process, because they have already established their own coordination mechanisms and offered solutions at the national, regional, and global levels. Parties to MEAs have based these mechanisms and solutions on best practices and lessons learned within the context of an important challenge—the availability of resources—which is a challenge the 2030 Agenda also faces.

Current environmental issues call for an integrated approach to ensure the effective implementation of the 2030 Agenda, SDGs, and internationally agreed environmental goals under MEAs. Active and continuous

engagement of parties to MEAs and their governing bodies and secretariats is critical to the successful delivery of the 2030 Agenda in accordance with their respective mandates. Close cooperation with the United Nations Environment Programme—the leading environment authority in the United Nations system—as well as with other partners at all levels is also critical.

The track records of MEAs, as carried out by the parties’ national environmental legislation, have much to offer in this regard and could support the implementation of SDGs by providing lessons learned on:

- institutional frameworks for sustainable development and strengthening environmental governance at global, regional, and national levels and promoting international cooperation, coordination, and partnerships and synergies;
- addressing climate change issues in the context of the 2015 Paris agreement and negotiation of new amendments on hydrofluorocarbons under the Montreal Protocol on Substances that Deplete the Ozone Layer;
- biodiversity and sustainable use of ecosystems, including sustainable natural resource management, sustainable land management, integrated water management, and the combatting of illegal trade in wildlife;
- sound management of chemicals and waste, including hazardous waste, and the combatting of illegal trade in chemicals and hazardous waste;
- oceans, seas, and coastal areas, including marine debris and microplastics; and
- monitoring, review, compliance, enforcement, and reporting on MEA goals.

The setting of SDGs offers opportunities to expand and deepen the role of MEAs in the global and national

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development process, as well as opportunities to enhance the integrated approach to partnerships and mutually beneficial cooperation among all relevant stakeholders. The 2030 Agenda brings new opportunities to speed up the implementation of current strategic plans of MEAs, many of which are expected to be implemented between 2020 and 2024 (e.g., the Strategic Plan for Biodiversity, including the Aichi Biodiversity Targets, for the 2011-2020 period; the Strategic Plan for the Cartagena Protocol on Biosafety for the period 2011-2020; the CITES Strategic Vision: 2008-2020; the Strategic Plan for Migratory Species 2015-2023; the Ramsar Convention Strategic Plan 2016-2024; the Strategic Action Plan for the Implementation of the World Heritage Convention: 2012-2022; Ten-Year Strategic Plan and Framework for the United Nations Convention to Combat Desertification (2008-2018); and the Basel Convention Strategic Framework for 2012-2021, among others). At the same time, it brings new opportunities to re-think and agree on follow-up to these MEAs and their reflection in relevant national strategies, action plans, and concrete implementation projects and activities. The integrated, holistic approach to all of the MEAs should be a priority at all levels to ensure that available capacities, resources, and instruments are used efficiently and bring as many benefits as possible for the sustainable development of countries and for the environment.

The role of SAIs and their global, regional, and sub-regional networks, including INTOSAI, is of utmost importance as member states begin implementing the goals outlined in the 2030 Agenda and MEAs. SAIs with experience and expertise can guarantee independent, cross-sectoral assessments and audits of national efforts to achieve SDGs and MEAs to supplement assessments specified by the MEA itself. Typically, evaluations and audits of national institutions that address the environment and MEAs are carried out by entities such as Ministries of Environment, Agriculture, Energy, and Climate. But what is needed at this stage is independent, efficient, high quality audit institutions that can tackle the challenge of evaluating the effectiveness of the implementation of the goals of the 2030 Agenda and MEAs at both the national and local level in an integrated way. These audit institutions should establish regional and subregional networks to assess the transboundary aspects of implementation of SDGs and MEA goals. INTOSAI, its partners in individual countries, and its networks in regions can play this challenging role.

*Submitted by Jiří Hlaváček, PhD. Dr. Hlaváček is a Special Advisor in the Division of Environmental Law and Conventions of the United Nations Environment Programme (UNEP). The UN's 2030 Agenda for Sustainable Development can be found at <https://sustainabledevelopment.un.org/post2015/transformingourworld>.*

## Continuation of Chairman's Message

(continued from p. 1)

Sustainable development and other environmental issues have become major global concerns. The SAIs' mandate is to support efforts to enhance environmental quality at the national, regional, and global level. These efforts include ensuring the successful implementation of environmental rules and regulations at various levels of government, including Multilateral Environmental Agreements (MEAs) such as the CBD and UNFCCC. Issues related to MEAs will be key topics at this year's WGEA Assembly meeting. As a team, we can work together to improve the quality of our environments through workshops, training, and cooperative audits, and by developing audit research and manuals and updating relevant guidelines, such as the 2007 "Auditing Biodiversity: Guidance for Supreme Audit Institutions."

Finally, allow me to express my deepest gratitude once again to all SAIs that have participated in WGEA's Annual Audit Collection and 8th Survey on Environmental Audits. Both of these programs will be useful media for sharing knowledge, experience, and information between INTOSAI and the INTOSAI WGEA community. The active roles of SAIs in these programs are much appreciated.

I look forward to seeing all of you at the 17th INTOSAI WGEA Assembly in Jakarta.

Thank you,

**Harry Azhar Azis, Ph.D**

**Chairman of the Audit Board of the Republic of Indonesia**

### **WGEA Secretariat Attends Meetings of the Convention on Biological Diversity**

To increase its cooperation with international organizations, the WGEA Secretariat attended two meetings organized for the Convention on Biological Diversity (CBD). The first meeting, held 16–18 March 2016 in Bern, Switzerland, was an informal working group dedicated to developing a voluntary peer review process for the CBD. The meeting aimed to further develop a methodology for voluntary peer review of the implementation of the CBD, particularly with regard to National Biodiversity Strategies and Action Plans and the CBD's 2011–2020 Strategic Plan for Biodiversity. At this meeting, the Secretariat presented WGEA's experiences with national auditing of biodiversity and the use of the Guidelines for Biodiversity Auditing.

The second meeting was the Friends of CBD workshop, held 21–23 March in Bogis-Bossey, Switzerland. At this meeting, the Secretariat gave a presentation on Perspective Accountability, Transparency, and Liability in the Context of Environmental Audit and CBD/Multilateral Environmental Agreements. In addition, the Secretariat had a bilateral meeting with the Executive Secretary of CBD to discuss potential collaboration between WGEA and the CBD.

### **Upcoming 17<sup>th</sup> INTOSAI WGEA Meeting**

The 17th INTOSAI WGEA Meeting will be held 24–27 October 2016 in Jakarta, Indonesia. The meeting will include a presentation of WGEA projects from the 2014–2016 workplan and the development of the 2017–2019 workplan. The meeting will also provide a forum for sharing knowledge related to Sustainable Development Goals, the progress of Multilateral Environmental Agreements, and other current issues in environmental auditing. The invitation and a detailed meeting programme have been sent to all INTOSAI members. For further information, please contact the WGEA Secretariat at [wgea@bpk.go.id](mailto:wgea@bpk.go.id).

### **Secretariat's Annual Audit Collection and 8th Survey on Environmental Audits**

In response to the Annual Audit Collection, the Secretariat received 196 audit collections from 35 SAIs on topics ranging from energy policy to soil and land governance. These new audit collections, along with previous collections, are available on the WGEA website (<http://environmental-auditing.org>). The Secretariat remains open to receiving new audit collections from SAIs to continue to populate these audit collections.

With regard to the 8<sup>th</sup> Survey on Environmental Audits, the Secretariat received responses from 58 SAIs. The survey responses will be available on the WGEA website soon.

### **Academic Research on Environmental Performance Audits**

WGEA organized a survey of SAIs to provide information and support to a PhD student at the Australian National University as he conducted research on environmental performance auditing. The student, Awadhesh Prasad, has undertaken the following:

- A longitudinal analysis of environmental performance audit data from 1992 through 2012 located on the WGEA website. The analysis also considered the relationship between the amount and types of environmental auditing performed and national socio-economic data.
- A survey of SAIs to investigate their current practices and challenges they face in environmental performance auditing.
- A comparative study of environmental performance auditing in Australia, Canada, and India.

*Results from the research are being prepared for future publication. For further information, contact: [Awadhesh.Prasad@anu.edu.au](mailto:Awadhesh.Prasad@anu.edu.au).*





### **AUSTRALIA: ANAO audit of Australia's Antarctic Program**

In February 2016, the Australian National Audit Office (ANAO) completed an audit of the Australian Antarctic Program. The program is administered by the Commonwealth Department of the Environment with the aim of advancing Australia's strategic, scientific, and environmental interests in the Antarctic. Australia maintains four permanent stations in the Antarctic and subantarctic region. The department transports around 400 staff to its stations each summer to conduct and support scientific research and to build and maintain facilities. In the winter, each station is maintained by a small crew of around 15 to 20 people. Each station requires sufficient supplies and technical expertise to survive the isolated winter months, manage the busy summer season, and cope with unexpected events throughout the year, such as medical emergencies or delayed re-supply due to weather or ice conditions.

The audit examined the effectiveness of the department's arrangements to support the program. It found that there were mature policies and frameworks to support the effective delivery of key program responsibilities such as strategic and operational planning; risk management; and expeditioner recruitment, induction, and training. The audit concluded that the program had sound administrative practices to support program delivery, including a management system for a large number of diverse contracts for the provision of good and services, a public communications program, and a range of support services for expeditioners and their families.

The audit also concluded that there was justification for the department to regularly review the effectiveness and appropriateness of policies, frameworks, and administrative practices for the Antarctic program, particularly in light of reduced program funding over time and the resulting need for more efficient operations. The ANAO made four recommendations to strengthen asset management and information technology project governance and management arrangements; improve the management of work, health, and safety investigations; and enhance the existing performance measurement and reporting framework.

A copy of ANAO Report No. 22 of 2015-16, *Supporting the Australian Antarctic Program*, is available on the ANAO's website at <http://www.anao.gov.au>.

For further information, please contact Bronwen Jagers at [bronwen.jagers@anao.gov.au](mailto:bronwen.jagers@anao.gov.au).



### **Brazil: Work on sustainable development goals and a drought policy audit**

#### Initiating Work on Sustainable Development Goals

The SAI of Brazil (TCU) is carrying out groundbreaking work at the international level on Sustainable Development Goals (SDG), which contributes to the fulfilment of international agreements on sustainable development. The implementation of SDGs is a challenge that requires a global partnership and the active participation of governments, citizens, the private sector, and academia, among others. SAIs may contribute to this global agenda based on their positions in national systems and their mandates. The United Nations also recognizes the important role of SAIs in achieving national and international development goals and the positive influence of SAIs in strengthening institutions and increasing transparency and public confidence in governments.

In this role, TCU, within the Special Technical Commission on the Environment of the Latin American and Caribbean Supreme Audit Institutions, will be responsible for coordinating a joint audit that will produce a systematic assessment of SDG implementation at the regional level. This work aims to develop a methodology to enable SAIs to evaluate national governments' preparation for implementing SDGs. Because the implementation of this global agenda will require continuous engagement and effort, TCU is linking its actions to each SGD to allow for their long-term monitoring.

#### Drought Policy Audit

TCU recently recommended that the federal government strengthen the development of a national drought policy based on risk management by formalizing related activities and defining their objectives, actions, responsibilities, and deadlines. In recent years, parts of Brazil have started to face more frequent scenarios of severe water scarcity. In 2012 and 2013, the Northeastern semi-arid region went through a "100-year drought" and, in several places in the Southeast, 2014 was the driest year on record.

Historically, Brazil has addressed droughts using a crisis management model based mainly on reactive disaster response. Brazil is currently reassessing that strategy and considering a proactive approach focused on risk management, which emphasizes increasing the resilience of water resources management systems by adopting early mitigation measures. However, this initiative is still at a preliminary stage, with the development of a pilot

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project for drought monitoring in the Northeast, and no plans for completion of the later stages.

TCU's audit of Brazil's drought policy found that additional measures have the potential to provide greater resilience to water resources management in the country. These include the need to fight the contamination of water sources and encourage the efficient use of water. The high level of organic pollution of water sources is associated with the low prioritization of infrastructure investments in critical watersheds in terms of the quality and quantity of the water resources. That reveals a possible mismatch between sanitation policies and water resources management.

With regard to water use efficiency, the audit also found that the high level of losses in distribution networks in most municipalities is a cause for concern. Cities with excellent levels of performance have loss rates under 15 percent. In Brazil, however, the average loss rate was 37 percent in 2013. Moreover, incentives to reduce water use are insufficient. Water fees are in place but are too low to change users' behaviors. The country has not adopted a water efficiency labeling scheme to encourage consumers and the industry towards products that consume less water, and gaps in regulation inhibit the direct use of reclaimed water for non-industrial purposes.

*For further information, please contact Junnius Arifa at [junniusma@tcu.gov.br](mailto:junniusma@tcu.gov.br).*



## **BULGARIA: NAO audits the nation's flood prevention and response capabilities**

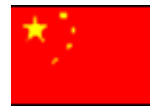
From 2010 through 2014, 2,632 floods occurred in Bulgaria, causing casualties and more than €222 million in damage. The state incurred costs of more than €163 million. Scientists predict an increase in the frequency and intensity of future flooding. In 2015, the Bulgarian National Audit Office (BNAO) launched two audits on this topic.

The first audit is a review of the Ministry of Interior's regional and municipal activities from 2012 through 2014. This audit assesses the effectiveness of the actions taken to prevent and overcome the consequences of floods under the National Programme for Protection against Disasters.

The second audit is a review of the implementation of a specific procedure for developing flood risk plans. The aim of this procedure, which was implemented from 2012 through 2015, is to provide financial support for the development of the necessary documents in accordance with Directive 2007/60/EC. This Directive includes a methodology for developing a cost-benefit assessment of flood risk management measures and calls for the creation of a digital relief model, the development of a

national catalogue of measures and national priorities, and the introduction of an information system. The audit includes an assessment of the implementation of the projects funded under the procedure and examines the extent to which the measures and action plans may contribute to limiting the risk of adverse consequences for the population and the environment from the harmful effects of flooding.

*For further information, please contact Eva Galabinova at [e.galabinova@bulnao.government.bg](mailto:e.galabinova@bulnao.government.bg) and the Bulgarian National Audit Office at [intrel@bulnao.government.bg](mailto:intrel@bulnao.government.bg).*



## **CHINA: CNAO plans to audit natural resource use and environmental protection under outgoing leading officials**

The National Audit Office of China (CNAO) will conduct a pilot audit of natural resource use and environmental protection under outgoing leading officials. The pilot audit will target the performance of outgoing officials' management of natural resources and assets as well as environmental protection over their tenure. According to CNAO officials, this audit is a part of important reforms to promote ecological progress. Key areas the pilot audit will address include land, water, and forest resources; ecological restoration of mining sites; and water, air, and soil pollution prevention.

*For further information, please contact CNAO at [cnao@audit.gov.cn](mailto:cnao@audit.gov.cn).*



## **COSTA RICA: Audit assesses efforts to provide irrigation and drainage solutions in regions exposed to extreme weather**

The Office of the Comptroller General of the Republic of Costa Rica audited the National Irrigation and Drainage Service (SENARA) to evaluate whether its efforts to develop, manage, operate, and maintain irrigation and drainage systems in areas exposed to extreme weather support agricultural activity and will meet needs in the short, medium, and long term. The audit found the following:

**Gaps in infrastructure coverage:** Current infrastructure coverage only moderately addresses extreme weather. Specifically, irrigation and drainage infrastructure is located in 45 percent of agricultural production areas at high risk for extreme weather, in 47 percent of areas at medium risk, and in 8 percent of areas at low risk. The agricultural sector has experienced great financial losses as a result of extreme weather events, and 83 percent of

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these events happened in medium- to high-risk areas. Specifically, from 2005 through 2010, the agricultural sector lost \$92 million dollars as a result of extreme rain and \$4 million dollars due to drought. Despite these losses, SENARA lacks a model to manage irrigation and drainage systems that considers climate variables.

**Inefficient water use:** Water use in the Arenal-Tempisque Irrigation District is inefficient because of the poor condition of the canals and irrigation equipment, the use of a gravity irrigation system—the most inefficient in the world—and the lack of water storage infrastructure to manage the flows coming from reservoirs. This inefficiency is unsustainable under changing climate scenarios.

**Small irrigation districts at high-risk:** SENARA is not required to monitor or maintain small irrigation and drainage systems, and therefore, has little control over them. As a result, these systems are at high risk under changing climate scenarios, which could lead to poor water quality and quantity.

The audit team recommended that SENARA use a management model that incorporates climate variables and considers efficiency, infrastructure, and coverage to address agricultural requirements and the challenges of climate change in the short, medium, and long term.

*For further information, please contact Mrs. Lilliam Marín Guillén, Manager, Environmental and Energy Area, at [lilliam.marin@cqr.go.cr](mailto:lilliam.marin@cqr.go.cr).*



## ECUADOR: SAI participates in coordinated audit of environmental liabilities

From February 2-4, 2016, the SAIs of the countries of Brazil, Chile, Colombia, Dominican Republic, Ecuador, Honduras, Mexico, Paraguay, and Peru and the provinces of Buenos Aires and Santa Fe met in Quito, Ecuador, to consolidate the results of their coordinated audit of environmental liabilities. The audit seeks to develop a framework for managing environmental liabilities in the mining sector.

During the meeting, organized by the Organization of Latin American and Caribbean Supreme Audit Institutions, participants presented their audit findings and recommendations and shared lessons learned. In addition, participants exchanged ideas on criteria, methodologies, and tools that will help generate recommendations for the consolidated report and improve the process for future coordinated audits.

Ecuador's SAI focused its audit on the remediation of environmental liabilities generated by metal mining in the areas of Rio Santiago, located in the province of

Esmeraldas; Puyango, in the province of El Oro; and Camilo Ponce Enriquez, in the province of Azuay. While Ecuador's National Development Plan for Good Living prioritizes these three areas, the audit team also considered mining liabilities in other areas.

The audit included the following entities:

- The Ministry of the Environment
- The Social and Environmental Restoration Program (PRAS)
- The Ministry of Mining
- The Mining Regulation and Control Agency, and
- Ecuador's National Mining Company.

The audit found that Ecuador's national legislation defines environmental liabilities, and PRAS is responsible for implementing comprehensive remediation policies. However, the government has not identified the institution(s) responsible for eliminating pollution sources in cases where the party responsible for the pollution is unknown.

In 2015, PRAS published a comprehensive remediation plan for the Puyango River basin. The plan identified biophysical, economic, and social indicators that help demonstrate the environmental impact in this area and determine clean-up and remediation needs. However, these needs will require about \$1.5 billion in resources—equivalent to 432 years of the 2015 PRAS budget and 15 years of the 2015 Ministry of the Environment budget. Considering these high costs, and to avoid a generation of environmental liabilities, the audit concluded that SAIs should focus their efforts on ensuring compliance with prevention and control rules and regulations.



## ESTONIA: NAO expresses concerns with national strategic plans for energy production

The energy production sector has the greatest environmental impact within Estonia, and the NAO of Estonia has conducted several audits of the energy production and oil shale industries.

In late 2015 and early 2016, the Estonian government submitted two important strategic documents to the Parliament for approval: the Estonian Long-Term Energy Strategy and the National Development Plan for the Utilization of Oil Shale. These strategic plans are crucial in guiding the development of the sector and identifying plans to reduce adverse environmental impacts over the next 15 years.

NAO submitted an opinion to the government that identifies shortcomings in these documents, including a lack of data and fundamental studies underlying their

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conclusions and the absence of a clear link between objectives, measures, and established performance indicators. Moreover, NAO pointed out that neither of these strategic plans supports the objectives of European Union energy and climate policies or the targets identified in the Paris climate agreement to reduce greenhouse gas emissions. NAO concluded that substantial changes should be made in Estonian energy policy to achieve these targets. The NAO of Estonia has also presented its concerns to the Parliament and remains hopeful that the government and Parliament will address them.

*For further information, please contact Airi Andresson, Audit Manager at the NAO of Estonia, [airi.andresson@riigikontroll.ee](mailto:airi.andresson@riigikontroll.ee).*



## **KUWAIT: Hosting the 8th Meeting of the Environmental Working Group of ARABOSAI leads to future collaboration**

In April 2015, the State Audit Bureau of Kuwait hosted the 8<sup>th</sup> Meeting of the Environmental Working Group of the Arab Organization of Supreme Audit Institutions (ARABOSAI). At the meeting, Kuwait's Ministry of Health presented a working paper on medical waste disposal practices, and participating countries discussed how they would collaborate on audit topics of common interest from 2016 to 2018.

In its presentation, Kuwait's Ministry of Health noted several problems with hazardous medical waste disposal practices. First, there are often weaknesses in coordination between departments that handle hazardous medical waste, and at times, the party responsible for managing hazardous medical waste may be unclear. Second, at some clinics and hospitals, hazardous medical waste is not segregated from other waste. Further, most hospitals lack a required storage site for hazardous medical waste before it is transferred to a disposal facility. Finally, the Ministry of Health of Kuwait found that there was no comprehensive planning for hazardous medical waste.

At the meeting, representatives from nine countries also shared research documents and agreed to work collaboratively on a number of topics. Representatives in attendance discussed their interest in collaborating on:

- the environmental effect of liquid industrial wastes;
- how environmental laws, regulations, and related decisions compare and contrast among member states;
- the auditing of public gardens, greenspaces, and natural reserves;
- coastline issues;
- the potential environmental and human health effects of communication towers; and

- procedures for conducting environmental audits.

*For further information, please contact the International Organizations Department of the State Audit Bureau at [training@sabq8.org](mailto:training@sabq8.org).*



## **LATVIA: State Audit Office evaluates municipal waste management**

In February 2015, the State Audit Office of the Republic of Latvia (SAO) issued a report on its audit of the municipal waste management system's compliance with its objectives and legal requirements. Among other things, SAO found that, from January 2012 to June 2014, waste management companies in 44 local jurisdictions overcharged customers for waste management services by €3.6 million. Of that amount, about €1.6 million resulted from companies charging customers the natural resource tax for landfill disposal of waste that was not disposed of but was instead recycled. Approximately €2 million of the overcharge resulted from a difference in the way companies in 25 local jurisdictions calculated customer fees and the way they were charged by landfills for ultimate waste disposal. Specifically, the companies calculated customer fees based on the volume of the waste but were charged by landfills based on weight. The customer fee calculation assumed that 1 cubic meter of waste weighed 200 kilograms, but SAO found that this assumption generally overestimated the weight and hence the actual cost of disposal.

SAO also found that service contracts between waste management companies and their customers included a number of unfair provisions related to contractual penalties, dispute resolution, and rights of service refusal, among other things. In addition, SAO found that contracts between waste management companies and local governments in most cases did not protect local government interests. For example, some contracts did not include any requirements for the quality of services to be provided or for penalties where obligations were not met. Moreover, SAO found that an average of 56 percent of individual households in a sample of local jurisdictions had not contracted for waste management services. SAO concluded that such households disposed of their waste using other households' containers, thereby shifting the cost to those with service contracts, or used no containers and instead polluted the environment. SAO made 26 recommendations aimed at eliminating deficiencies identified by the audit, each of which the audited entities agreed to implement.

*An English version of the full audit report can be found at <http://www.lrvk.gov.lv/en/revizija/compliance-municipal-waste-management-system-intended-objectives-regulatory-enactments/>.*



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For further information, please contact Mr Jānis Salenieks at [Janis.Salienieks@lrvk.gov.lv](mailto:Janis.Salienieks@lrvk.gov.lv).



## NEW ZEALAND: Principles for effectively co-governing natural resources

The Auditor-General of New Zealand has released a report examining approaches to shared governance, or co-governance, of natural resources.

Co-governance arrangements for natural resources are an emerging trend in New Zealand. They often involve shared governance or management arrangements between central and local government entities and indigenous people (Maori) for a natural resource such as a lake, river, park, or reserve. Such arrangements can recognise Maori traditional and cultural interests in managing the environment and natural resources.

An example of a co-governance entity is the Waikato River Authority, responsible for the environmental management of New Zealand's longest river. Half of the governing body of the Authority is appointed by the Crown, and half is appointed by the Maori tribes associated with the river. One of the Authority's functions is to administer Crown funding for projects to improve the biodiversity and environmental health of the river.

The Auditor-General's report, *Principles for Co-governing Natural Resources*, outlines some of the ways to co-govern environmental initiatives. The report draws on the experiences of eight co-governed initiatives to identify principles to consider when setting up and running co-governance and co-management initiatives.

The principles address the importance of investing in the relationship between the co-governors and maintaining the investment. The principles call for co-governors to:

- Build and maintain a shared understanding of what everyone is trying to achieve;
- Build the structures, processes, and understanding about how people will work together;
- Involve people who have the right experience and capacity;
- Be accountable and transparent about performance, achievements, and challenges; and,
- Plan for financial sustainability and adapt as circumstances change.

The report also highlights some practical lessons that could help to achieve successful co-governance. These lessons should be of interest to SAIs looking at governance arrangements in the environment sector.

The report does not examine the effectiveness of the arrangements as many are new, but follow-up work may do so.

The full report can be found at [www.oag.govt.nz](http://www.oag.govt.nz). For further information, please contact Jonathan Keate at [jonathan.keate@oag.govt.nz](mailto:jonathan.keate@oag.govt.nz).



## SLOVAKIA: Auditing energy savings

In 2015, the SAI of Slovakia performed a combined compliance and performance audit as a part of the INTOSAI WGEA project on energy savings. Energy efficiency is arguably one of the most cost effective ways to increase the energy supply. For this reason, the European Union (EU) has set a target to save 20 percent of its primary energy consumption by 2020. The combined effects of implementing existing and new EU energy efficiency measures have the potential to save €1,000 per household per year, create almost 2 million jobs, and reduce annual greenhouse gas emissions by 740 million tons.

The objective of the SAI's audit was to assess the extent to which Slovakia has fulfilled key tasks related to energy efficiency as described in international agreements and EU legislation. The audit focused on the Ministry of Economy, as well as several other government agencies, from 2012 to 2014.

The audit found that Slovakia had adopted and implemented all EU Directives related to energy effectiveness and energy savings into its legal framework. The Ministry of Economy assessed the fulfillment of the national targets every year and amended the targets as needed, informed the European Commission (EC) of its activities, and published the relevant reports on its web site. It also established a permanent intra-ministerial commission to prepare action plans for energy effectiveness in Slovakia.

The audit also identified several shortcomings related to government agencies' fulfilment of key tasks. For example, the audit found that government agencies did not have sufficient financial resources to fund energy efficiency activities and that those activities were fragmented and not coordinated among agencies. In addition, the audit found that government agencies lacked adequate numbers of staff to carry out these tasks and that existing employees did not have sufficient qualifications or adequate time to fulfill their duties. To address these shortcomings, the Slovakian government approved 27 measures. The SAI will monitor their fulfilment.

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The Slovak summary of the audit can be found at:  
<https://www.nku.gov.sk/documents/10157/d415b7c7-cb02-49ce-bea5-10ad20aa83d2>.

For further information, please contact Igor Blaško at [igor.blasko@nku.gov.sk](mailto:igor.blasko@nku.gov.sk).



## THAILAND: Auditing the performance of the Independent Commission on Environment and Health

In 2015, the Office of the Auditor General of Thailand audited the performance of the Independent Commission on Environment and Health from 2011 through 2014. The Commission is charged with reporting on whether projects approved by the Office of Natural Resource and Environmental Policy and Planning may damage the environment or community health before government agencies consider granting permission to implement them.

The audit found that the Commission identified some projects that had been approved by the Office of Natural Resource and Environmental Policy and Planning that could cause damage to the environment or community health. These projects were already moving forward, possibly causing damage. As a result, a community near these projects filed a lawsuit in the Administrative Court of Thailand against the company sponsoring them. The Auditor General recommended that the Commission and the Office of Natural Resource and Environmental Policy and Planning bring concerns about the environmental or health effects of private sector projects to the National Environment Board for review by experts.

For further information, please contact the special audit group at [PAO2@oag.go.th](mailto:PAO2@oag.go.th).



## UKRAINE: International coordinated audit of Chernobyl Shelter Fund

On April 6-7, 2016, the Accounting Chamber of Ukraine chaired the Second Meeting of the EUROSAI Working Group on the Audit of Funds Allocated to Disasters and Catastrophes in Baku, Republic of Azerbaijan. During the meeting, auditors from 14 SAIs shared their experiences and shared achievements about auditing funds allocated to disasters and catastrophes.

The Accounting Chamber of Ukraine described its unique experience conducting an international audit of the Chernobyl Shelter Fund and a follow-up audit on the status of the recommendations in the original audit. The recommendations were aimed at mitigating the effects of the 1986 disaster at the Chernobyl Nuclear Power Plant.

The purpose of the follow-up audit was to examine the collaborative efforts of the global community to raise awareness of the Chernobyl disaster and to enhance international nuclear safety by identifying effective and efficient tools for preventing such accidents.

The Accounting Chamber of Ukraine found in 2015 that the joint efforts of various funders and collaborators—including efforts to implement the recommendations from the international coordinated audit of the shelter fund—had been essential for taking the Chernobyl Nuclear Power Plant out of service and encasing the reactor's existing emergency "object shelter" within a more ecologically safe confinement system. These funders and collaborators included the Assembly of Contributors of the Chernobyl Shelter Fund; the European Bank for Reconstruction and Development; the Government of Ukraine; the governments of the shelter fund donor countries; and the Government of Germany, as chair of the G7.

As of May 2016, construction of the New Safe Confinement system at Chernobyl is expected to be completed at the end of November 2017. However, continued financial support remains vital for completing the project.

For further information, please contact the International Cooperation Department of the Accounting Chamber of Ukraine at [rp25@ac-rada.gov.ua](mailto:rp25@ac-rada.gov.ua).



## UNITED STATES: Federal agencies need to take additional steps to protect bees

In March 2016, the U.S. Government Accountability Office (GAO) completed an audit of the U.S. government's efforts to protect the health of honey bees and other bee species. Bees provide valuable pollination services worth billions of dollars to farmers. Government and university researchers have documented declines in some populations of bee species. As a result, bee health has become a national concern. In June 2014, President Obama established the White House Pollinator Health Task Force co-chaired by the U.S. Department of Agriculture (USDA) and the Environmental Protection Agency (EPA).

GAO examined USDA's monitoring, research, and conservation programs and its efforts to disseminate information about bee health to the public. GAO also examined EPA's efforts to protect bees from risks posed by pesticides. As part of the audit methodology, GAO gathered stakeholders' views on efforts USDA and EPA could take to protect bee health. These stakeholders included representatives from 35 organizations, including farm groups, commercial beekeepers, pesticide manufacturing companies, state government agencies, universities, and environmental groups.

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GAO found that USDA and EPA have taken numerous actions to protect the health of bees; however, honey beekeepers continue to report rates of colony losses that they say are not economically sustainable. For example, on average, about 29 percent of honey bee colonies have died each winter since 2006. Although there is little data on the populations of other bee species, there is concern that these bee species also need additional protection.

The report made several recommendations to USDA and EPA to further protect bee health. For example, GAO recommended that USDA work with other federal agencies to develop a mechanism for monitoring native bee species populations and increase its evaluation of the effectiveness of efforts to restore and enhance bee habitat across the nation. GAO also recommended that EPA develop a plan for obtaining data from pesticide companies on the effects of pesticides on bee species other than honey bees and identify the mixtures of pesticides most commonly used on agricultural crops to help determine whether those mixtures pose greater risks than the sum of the risks posed by the individual pesticides.

*GAO's full report can be found at:*

*<http://www.gao.gov/products/GAO-16-220>.*

*For further information, please contact Anne Johnson at*

*[johnsonak@gao.gov](mailto:johnsonak@gao.gov).*