Ripple Effect

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A five-year report 2007-2012



RBC Blue Water Project™

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Thanks to our employees

Thousands of RBC employees around the world have taken part in activities that help protect water, from raising awareness to actually getting their feet wet, especially on our annual RBC Blue Water Day in June.



When we first launched the 10-year RBC Blue Water Project[™] in 2007, I remember people asking me why Canada's largest bank would make such a significant commitment to an issue that didn't quite connect to its business.



It's true: water is one of the most precious resources on earth, but it's so much a part of our daily lives that we rarely think about it.

But everyone needs water — it doesn't matter where you live or who you are. We all need water to stay alive, but water is also needed to grow crops, raise livestock, manufacture electronics and produce energy. In fact, there's not much in the world that doesn't need water.

However, the world's limited water supplies are under stress from climate change, over-consumption and pollution. In fact, back in 2008, I described the world's water woes as "the problem of the ages" — and I haven't changed my mind since.

When we call water a "liquid asset," it's not just a clever pun. Any industry that relies on water — and there aren't many that don't — should be thinking hard about whether or not it has secure access to water.

Many industries will need to better manage and reduce their water consumption as well as reduce their negative impact on the quality of water in our watersheds. This is especially true for industries that depend on water — like food and food services, utilities, power generation, mining and semi-conductor manufacturing.

Water matters to our families, our clients and our communities, and that's the reason we launched the RBC Blue Water Project in 2007.

Now, as we are celebrating the half-way point of the RBC Blue Water Project, we thought it would be a good time to pause and celebrate the impact of our more than 500 grant recipients — organizations that work tirelessly, every day, to care for our world's most precious resource.

I can't overstate the importance of these organizations and the staff and volunteers who fulfil their missions. We are proud to highlight a number of other programs and initiatives we've sponsored to help promote water awareness. We are privileged to share some of their stories with you here.

Gordon M. Nixon President and CEO RBC

A Five-Year Snapshot

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Since the launch of the RBC Blue Water Project in 2007, we've committed \$36 million to organizations worldwide for programs that protect and preserve water, with an additional \$6 million pledged to universities for water programs.* Here's a snapshot of our funding to date.**

136 Programs to reduce WATER CONSUMPTION Programs that support ABORIGINAL WATER

Programs to raise public awareness about WATER ISSUES



Programs that help

FARMERS

221 Programs to support RURAL REGIONS Programs dedicated to improving STORMWATER MANAGEMENT SYSTEMS

* Donations made by the RBC Blue Water Project are funded by RBC Foundation. ** Please note a single project may fall into multiple categories.







450+ Programs funded by grants of up to

S5.000

Programs dedicated to WATER QUALITY RESTORATION

Programs that prevent WATER POLLUTION

Programs funded by grants from \$25,000 -\$500,000

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Programs aiming to change WATER BEHAVIOUR



Programs dedicated to learning about water through ART OR EXHIBITS Programs that support both URBAN AND RURAL AREAS

81

Organizations that help RESTORE SHORELINES

RIPPLE EFFECT I 4

Youth



COMMITTED TO WATER PROGRAMS FOR YOUTH Of the 500 organizations we've funded since the inception of the RBC Blue Water Project in 2007, more than half were geared to children and students from kindergarten to the post-secondary level.

While many kids learn about water as part of their environmental studies in school (and we've funded a number of resources to help teachers), there are also lots of opportunities for children to learn about water stewardship outside the classroom. RBC[™] has funded 41 water festivals in communities across North America, including day or weekend-long programs filled with interactive activities that teach children about water right in their local watershed.

Other programs we've funded involve hands-on activities such as cleaning up river and lake shorelines, planting vegetation to protect wetlands and monitoring and collecting data to help watershed protection organizations.

"Our students experienced hands-on research in a real life situation, with experts giving guidance and encouragement," said a teacher who was part of the Lake Ecology Field Program, run by the Lake Winnipeg Research Consortium and funded by RBC. "Students became ambassadors and now understand the positive role they can play in ensuring the health of the lake continues."

We've also funded activities that combine arts and environmentalism, such as having children paint highly visible murals about water, providing a lasting reminder to children and the public about the importance of water.

Water programs we've funded for youth

Be the change

Students from the Netagamiou School in Chevery, Québec, started out doing a class project to analyze local water samples, but got so enthusiastic about what they learned that they ended up doing a full shoreline cleanup as well.

This is just one of the hundreds of hands-on projects Learning for a Sustainable Future (LSF) made possible thanks to the RBC Blue Water Project.

With funding of \$430,000, LSF acquired and enhanced tools for teachers, including lesson plans, water-themed learning materials and a popular online database of program resources that's used by more than 5,000 teachers each month, reaching almost 200,000 students every year. The organization also provided small grants so schools could purchase resources for their water-related action projects. To date, LSF has engaged more than 85,000 students, including those in 89 rural and 25 Aboriginal schools.

Pamela Schwartzberg, the group's Executive Director, says, "The most exciting part is seeing what the kids are doing with their projects."

The list of projects is impressive: High school students in New Brunswick delivered water testing workshops to elementary school students. Grade 6 students in Thomson, Manitoba, raised sturgeon and released them into the river, taking action against declining numbers in the region. Others planted native gardens, installed rain barrels and helped to stabilize shorelines from erosion.

"We're delighted to make a difference in the lives of so many children with help from the RBC Blue Water Project," says Schwartzberg. "Together, we're helping children to become stewards of this precious resource." O

Bahamas National Trust

Kids growing up in the Caribbean are surrounded by oceans, but that doesn't mean they don't value fresh water too. With RBC's support, the BNT created a water conservation program to help educate children about the importance of water and its impact on the community.

National **Aquarium in Baltimore**

The National Aquarium in Baltimore knows kids like to get their feet wet restoring habitats. RBC donated US\$130,000 to help the Aquarium engage more than 1,600 students, including some of Baltimore's most at-need

neighbourhoods, in wetland restoration. Children collected and removed 21,000 pieces of debris and restored 10 acres of wildlife habitat.

Donors Choose

This organization uses technology to help connect donors with teachers and schools in need of supplies. RBC donated more than \$129,000 to Donors Choose to help teachers purchase supplies and deliver thousands of hours of water education to more than 34,000 children across the United States.

Canadian Canoe Foundation

The Canadian Canoe Foundation is a one-of-akind organization that celebrates all things related to this guintessentially Canadian boat. With RBC's support, the Canadian Canoe Foundation ran week-long canoe trips for youth

in grades 9 to 11, who were then expected to educate their classmates about local watershed issues when they got back home.

PROGRAMS FUNDED FOR ELEMENTARY SCHOOL STUDENTS

FOR UNIVERS WATER PROGRAMS

PROGRAMS FUNDED FOR SECONDARY SCHOOL STUDENTS

Photo: *Canadian Geographic* RBC Blue Water Project Employee Photo Contest 2010

RIPPLE EFFECT I 6

Aboriginal People

A Na-cho Nyak Dun citizen catches a grayling in the Peel watershed during a visit to a sacred hotsprings site.

The water issues facing Canada's Aboriginal peoples on reserves represent a very serious challenge for the country, and solutions are not always easy to find. We support watershed protection planning initiatives, as well as programs that help youth and community leaders.

> COMMITTED TO ABORIGINAL WATER PROGRAMS

Canadians enjoy access to some of the safest drinking water in the world. Unless they happen to reside on a First Nations reserve, that is. Nearly half of First Nations' water systems in Canada fail to meet the country's guidelines for drinking water quality.

"Over 100 First Nation communities are currently under unsafe drinking water advisories, some for as long as 10 years," says Aboriginal leader Phil Fontaine. "At least another 85 communities have high-risk water treatment plants. These third-world conditions would be simply unacceptable to Canadians in smaller communities or in large urban centres."

Unfortunately, these drinking water problems stem from a complex and systemic web of causes, including failing infrastructure, inadequate operator training, unprotected source areas and inappropriate site and water-source selection.

RBC is working diligently to find and fund long-term solutions to the water woes facing Canada's Aboriginal people. Our goal is to identify and fund projects that address needs not currently being met by other funders or governments. As such, we have directed our RBC Blue Water Project grants towards watershed protection planning as well as programs that help youth and community leaders.

"It is heartening to see that through partnerships with First Nation organizations, these RBC Blue Water Project grants will fill some funding gaps so that First Nations people themselves can be knowledgeable and informed about water issues," says Fontaine. "We commend the RBC for its generous support of projects that address First Nations water issues."

Water programs we've funded for Aboriginal people

Our water, our future

The Centre for Indigenous Environmental Resources (CIER) is the only national First Nations environmental organization in Canada, and one of its main challenges is water.

"Canada's existing watershed planning and management frameworks don't take First Nations concerns and knowledge into account," says Lisa Hardess, Project Manager with CIER. "To make matters worse, inadequate resources and capacity often further limit our ability to engage in watershed planning in our traditional territories."

In 2010, determined to change the status quo, CIER embarked on a three-year project to create the First Nation Watershed Management Tool. The project, funded by a \$400,000 grant from the RBC Blue Water Project, provided First Nations communities with a framework for engaging in culturally appropriate methods to protect their land and water in traditional territories in British Columbia, Nova Scotia and Alberta.

In 2012, with its second grant from the RBC Blue Water Project, CIER launched a new program, Our Water - Our Future, to provide First Nations youth with the skills and know-how to protect source water and promote watershed awareness in their communities.

"We're providing 16 First Nations youth from across Canada with the training and the tools to become water leaders in their communities," says Hardess. Participants will propose solutions to their water challenges and organize their communities to take action.

"RBC is helping us stimulate a generation of leadership," says Hardess. "The impact will be huge. The funding landscape for these types of water projects is bleak. RBC is helping us shine a light in that dark place and helping our youth take positions of leadership to help solve these problems once and for all." •

Wildlands League

Collaboration between government and First Nations communities is the key to protecting watersheds in Canada's north. With RBC funding, the Wildlands League developed a watershed protection plan for the Shibogama Tribal Council, whose five communities live in two of only 12 unregulated watersheds left in North America south of 55°.

Safe Drinking Water Foundation

It can be daunting to provide programs for remote Aboriginal communities that can be located hundreds of kilometres away from one other. That's why RBC supported a webinar series offered by the Safe Drinking Water Foundation on water quality and preservation to Aboriginal

communities across Canada, reaching almost 300 community leaders.

Green **Communities**/ Well Aware Program

The water coming from your well looks clean and clear, but how can you be confident it's safe? With funding from RBC, the Well Aware Program helped 40 First Nations communities identify risks to well water and educated more than 950 people about the importance of proper well maintenance.

Canadian **Parks and Wilderness Society**

Canada's most dramatic wilderness can be found in the north. An RBC donation enabled CPAWS to protect the Yukon's Peel watershed, a vast and pristine fresh water resource in northern Yukon with great cultural significance for First Nations.

Through workshops, discussion and information sessions, CPAWS has informed the debate about the future of this almost roadless watershed, home to healthy populations of grizzlies, wolverines, caribou, peregrine falcons and a thriving wilderness tourism sector.

An elders' gathering takes place in Cache Creek after a day of discussion focused on how to protect the Peel watershed in the Yukon Territory, Canada.



PROGRAMS FUNDED FOR ABORIGINAL **PEOPLE**

Photos: Canadian Parks and Wilderness Society

ABORIGINAL RESERVES

IN CANADA ARE

UNDER BOIL-WATER

ADVISORIES

RIPPLE EFFECT 18

People in Crisis

A school boy drinks from a clean water source ONE DROP installed at his school in Léogâne, Haiti.

In a humanitarian crisis, access to clean water is a top priority, for drinking, agriculture and sanitation. When we created the RBC Blue Water Project in 2007, we intended to focus primarily on areas where RBC does business, such as Canada, the United States, the United Kingdom and the Caribbean. This, we hoped, would give our employees an "on the ground" chance to get involved with the charities we supported, as well as ensure we understood the local water issues as best as we could a best practice for water funders.

We didn't expect to provide international aid for programs in developing countries as there were so many other well-established organizations and companies better positioned than we were to do so.

But humanitarian crises have a way of hitting you right between the eyes.

In a crisis, access to clean water is a top priority, for drinking, agriculture and sanitation. So when our very first grant recipient, ONE DROP, asked us to partner with them for innovative programs in a few regions around the world where people were in crisis, we knew that this could be how we played our part.

ONE DROP, a Canadian charity established by Guy Laliberté, the founder of Cirque du Soleil, was created to fight poverty in the world by giving everyone access to water.

A little girl in Honduras uses the newly refurbished well in her community.

Photo: ONE DROP

RBC committed an unprecedented \$10 million to ONE DROP for projects in Canada and elsewhere, including these programs to support people in crisis.

Honduras

High temperatures and no rainfall can create serious problems in a region like Honduras' Guacirope River basin. The people in this mountainous region lack the resources, materials and infrastructure to collect the little rainwater they get. Things are made more complicated because extensive deforestation has deteriorated the soil's capacity to retain water. This means it's hard to grow food, causing poor health and poverty for local residents.

HONDURAS PROJECT \$1.5 million OVER THREE YEARS

So in 2008, RBC kick-started a program in Honduras with a commitment of \$1.5 million to enable ONE DROP and its partner, Oxfam Québec, to help locals learn to plant and irrigate droughttolerant food gardens, improving access to safe water and ensuring food security. True to its Cirque du Soleil roots, ONE DROP engaged the community with shows and educational, artistic workshops that helped create a culture of behavioural change.

This project had a positive impact on 1,000 families, some of whom were able to start small businesses selling the food they were able to grow, with spinoff benefits for over 15,000 people.

RBC 10-YEAR PLEDGE TO ONE DROP: \$10 million

Haiti

In 2010, Haiti was devastated by one of the worst earthquakes in recent memory. The town of Léogâne, some 32 kilometres from Port-au-Prince, was close to the earthquake's epicentre, and thus, saw the total collapse of its infrastructure, making access to drinking water almost impossible for its over 150,000 residents.

HAITI RECONSTRUCTION **\$1 million** OVER FOUR YEARS

Enter ONE DROP and Oxfam Québec, which used an RBC grant of \$1 million to provide access to safe drinking water, increase farming activities to help communities survive and generate income, and raise people's awareness about the issues of water, hygiene and sanitation.

While the work is still underway, the impacts are significant: 160 wells refurbished and 1,500 metres of irrigation channels refurbished, with over 4,000 people attending popular education shows to encourage behavioural change.

Project India

India is one of the most water-stressed countries in the world. In Orissa, one of India's poorest states, close to 40 per cent of the population does not have access to safe drinking water, and just 7 per cent of rural households have access to adequate sanitation facilities.

That's why ONE DROP partnered with local organizations to establish community-managed water supply and sanitation facilities and create an arts and education program in Orissa intended to provide lasting behavioural change with residents and in the community at large. RBC provided a grant of \$1.1 million for this program on behalf of all our clients from India.

PROJECT INDIA \$1.1 million OVER FOUR YEARS

With the project set to wrap up in 2013, ONE DROP has given 20,000 people access to water for drinking and sanitation, installed 100 water purification units in 100 villages, delivered educational arts-based workshops and produced 40 short films about the importance of water.

> ONE DROP engages communities through artistic workshops and educational sessions.

RIPPLE EFFECT I 10

Home & Property Owners



Sometimes, it feels like environmental issues are too big to be solved by individuals. But being water-smart at home can really have an impact.





About 10 per cent of the world's water is used by individuals in their homes, compared to 70 per cent used for agriculture and 20 per cent used for business.

If individual use of water is such a small percentage, you might ask, "Do my actions really matter?"

You bet they do.

When water habits — good or bad — are magnified by billions, the results can be world-changing. That's why RBC has funded projects that empower individuals to make positive changes in the way we use water at home, such as initiatives to help identify leaking pipes and educate homeowners about how to dispose of toxic substances in a way that's water-safe.

Since 2008, RBC has polled Canadian consumers about their water habits through the RBC Canadian Water Attitudes Study. The poll raises public awareness about water issues, and tracks whether the programs we're supporting in Canada are having an impact. Over the years, we've discovered that Canadians underestimate the amount of water they use every day, and many aren't aware of how badly in need of repair the municipal infrastructure that delivers water to our homes is.

Being water-smart at home and at the cottage helps ensure we can enjoy our natural spaces for years to come. And that's something to which we can all raise a glass.

Water programs we've funded for home owners

A community-based approach to restoring Lake Winnipeg

Phosphorus. It's required by all living cells. It's also a common ingredient in household products such as laundry detergents, fertilizers and dish soaps. But when it enters our waterways, phosphorus accelerates the growth of algae, which consumes oxygen in the water and kills fish and plants.

Excessive concentrations of nutrients like phosphorus are the bane of Lake Winnipeg's existence. That's why the leaders of nine area municipalities formed the South Basin Mayors and Reeves group: to help improve the health of the lake.

"Our communities all rely on the lake," says Tom Farrell, Reeve of the Rural Municipality of Victoria Beach and a founding member of the group. "We've all contributed to excess phosphorus over the past 30 years. Now, we're taking a community-based approach to addressing the problem."

With funding from the RBC Blue Water Project, the group created the Lake Friendly Practices program, aimed at encouraging residents to adapt basic habits at home that help protect the lake, such as buying safe cleaning products, and, for farmers, providing information on fertilizer and livestock management best practices.

The group distributed brochures, flyers and postcards to help raise awareness. They also created materials for teachers, since children can be persuasive ambassadors for environmentally friendly practices.

The program has been very well-received. "We're seeing more people getting involved. It's becoming a subject that's discussed in schools," says Farrell. "We're doing it in a way that motivates people to get involved, and these practices are having real social, economic and environmental benefits for the communities around Lake Winnipeg."

University of Calgary

One of the major challenges researchers face is making their findings relevant to homeowners and the community. The University of Calgary broke down this barrier by providing their findings on groundwater management through an online portal. With help from RBC, the

university educated 700 homeowners and 1,300 school children about their impact on local groundwater and surface water levels and the importance of monitoring water levels.

Chattahoochee Riverkeeper

Atlanta's water resources are reaching a breaking point, and its Chattahoochee River watershed is the smallest serving a metropolitan area in the entire U.S. A grant from RBC helped this organization educate the community about water efficiency and

sustainable land use. The presentation reached almost 2,500 stakeholders from local governments, businesses, neighbourhoods, churches, schools, garden clubs and environmental groups.

OneChange Foundation/ This Blue Dot

Did you know about 20 per cent of Canadian's toilets leak, adding about \$250 per year to a household's water bill? Working together, OneChange and RBC developed a unique

campaign to deliver more than 20,000 blue dot, leak-detecting kits to Ottawa residents.

Kawartha Region Conservation Authority

RBC is working to educate cottagers, many of whom rely on groundwater from wells for their drinking water. For example, RBC provided funding to the Kawartha Region Conservation Authority to educate nearly 800 cottagers in 17 lake-based communities about the importance

of permeable surfaces, natural cover and the preservation of habitats.

Two Blue Canoe staff members from Kawartha Conservation paddle out to contact local shoreline residents on Sturgeon Lake, Ontario.

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\$25.5 million DEDICATED TO COMMUNITY WATER PROGRAMS

RIPPLE EFFECT | 12

THA CONSERVATION BLUE CANOE

Farmers



Farmers have an important role to play in helping protect our water, not only because 70 per cent of the world's fresh water is used for crop and livestock production, but also because agricultural runoff poses an increasingly serious threat to water quality.

> COMMITTED TO PROGRAMS AFFECTING FARMERS

RBC has a long history of working collaboratively with Canada's agricultural sector — a track record that reaches back to when John A. Macdonald was the country's first Prime Minister. More than 135 years later, RBC continues to serve more farmers and farming families than any other financial institution in the land.

Farming is a water-intensive business. The agricultural industry uses 70 per cent of all the fresh water consumed in the world. While that 70 per cent is key to sustaining our global food sources, farmers like Ingrid Vanderschot understand they have a responsibility to help restore the watersheds where they operate.

"We are a young family and recently purchased the farm. Thanks to RBC, we were able to plant 1,250 native trees on two acres of steep farmland," says Vanderschot, a farm owner who received funding from RBC Blue Water Project grant recipient Upper Thames River Conservation Authority in Ontario. "This field was eroding badly and was on our wish list to naturalize, but it was too costly. We know this will help protect water quality in the nearby Thames River and provide habitat for local wildlife."

RBC remains committed to supporting this integral sector of the economy and enabling positive change in the communities where our farming clients live and work. We recognize the important role the farming community plays in producing the food that ends up on the world's dinner tables. And we maintain a deep, continued interest in identifying and funding programs and initiatives, such as some of those listed here, that support our agricultural clients. •

Water programs we've funded for farmers

Seeds of change

Water. It's the lifeblood of every farming operation. However, some farming practices, like over-fertilization or sub-optimal livestock management, can cause serious damage to the water supplies we all rely on. The problems can be particularly acute in Québec, where frequent flooding can wash fertilizer and other pollutants into area waterways.

By encouraging farmers to adopt more environmentally friendly practices, Fondation de la faune du Québec is helping clean up the province's waterways.

Farming is a vital, yet economically challenging, industry. Some farmers are hesitant to change their operational practices out of concerns they'll sacrifice their alreadynarrow profit margins. Fondation de la faune du Québec, however, is demonstrating to farmers that there are ways to adapt their practices while still doing right by the environment and wildlife habitats.

OF CANADIANS SAY THAT WATER USE IN AGRICULTURE SHOULD BE A TOP **PRIORITY IN TIMES OF WATER** SCARCITY.

The provincial wildlife conservation group has made the enhancement of Québec's rivers and streams a core part of its mission, and the organization works with, rather than against, farmers to protect wetlands. In 2011, using funding from the RBC Blue Water Project, the group encouraged farmers to adopt more environmentally friendly practices and increased public awareness of the importance of watersheds to the ecosystems and fish habitats.

Source: 2011 RBC Canadian Water Attitudes Study

> Their efforts are already paying off. Thanks to the group's efforts, the area's rivers and streams are witnessing improvements in water quality and a resurgence of wildlife populations.

"Clean water is vital to our existence," says Sébastien Rioux, Project Coordinator for Fondation de la faune du Québec. "By working with area farmers to help clean up rivers and streams, we're ensuring that people and wildlife can continue to enjoy and use our waterways for years to come." O

Wildlife Conservation **Society**

As a significant emerging world market, it's no wonder Brazil's farming industry is growing so rapidly. The Wildlife Conservation Society works with private property owners, rural communities and partner organizations in the Pantanal region of Brazil to implement ranching best practices. RBC

funding enabled the Society to provide a measurable recovery of wetlands, reduce water contamination and increase pasture productivity and profits for ranchers.

International **Institute for Sustainable Development**

Innovation is key when trying to solve environmental problems. By collaborating with farm owners, IISD used RBC funding to develop innovative uses for the cattail in farming to further develop the bioeconomy and wetland habitats in

Manitoba. As a result, Lake Winnipeg could become a massive regional economic development and cleantech innovation opportunity.

Great River Greening

When you live in the "Land of 10,000 Lakes" in Minnesota, it's easy to take fresh water for granted. But 40 per cent of the water in the area is unsafe for drinking, swimming and fishing, and unsustainable agricultural practices are part of the problem. That's why Great River Greening

encourages farmers and farmland owners to develop conservation plans to reduce pollution. With a donation from RBC, this organization has provided educational material to 500 farmers and implemented 20 conservation practices in two watersheds.

Pacific Salmon **Foundation**

The Pacific Salmon Foundation launched the Salmon-Safe BC program with RBC funding to certify farms that adopt management practices that protect fish. To earn certification, farms must improve irrigation efficiency, reduce runoff and erosion and protect wildlife habitats. To date, more than 35 farms and vineyards have been certified.

PROGRAMS **FUNDED IN** RURAL AREAS

PROGRAMS **FUNDED FOR** FARMERS

Gallery Goers

ocean l'océan

> Museums... science centres... art galleries. These institutions are expert at communicating ideas that are sometimes too complicated for words. We're proud to support so many that have taken up the water challenge.

Canadian **Museum of** Nature

A 2,883-kilogram blue whale skeleton is the star attraction at the RBC Blue Water Gallery in the Canadian Museum of Nature.

> Explore the amazing diversity found in marine and fresh waters at the RBC Blue Water Gallery at the Canadian Museum of Nature in Ottawa, Ontario. Interactive

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displays, models, videos and even a real skeleton of a blue whale have captivated more than 1.3 million visitors since the gallery's opening in May 2010.

Taking on a uniquely Canadian look and feel, the ROM's Water exhibit in 2011 was a dramatic sensory and educational experience for more than 400,000 visitors of all ages. Sponsored by RBC, the exhibit used cutting-edge technology, multimedia, hands-on exhibits and live animals to illuminate the essential role water plays in our lives and the urgent need to protect it.

Photos: Canadian

Museum of Nature

Royal Ontario **Museum** (ROM)

Photos: Royal Ontario Museu

The science of water

"Make science fun." That's the guiding mission of Halifax, Nova Scotia's Discovery Centre. The Centre, which welcomes approximately 80,000 visitors per year, features a mix of interactive and thought-provoking exhibitions (both permanent and travelling) for people of all ages.

In 2010, the Discovery Centre unveiled *Water and Our World* to increase awareness of the water cycle and the importance of conserving this precious resource.

Water and Our World included a permanent, interactive exhibit located at the Centre. A travelling outreach component, called *Science on the Road*, was also developed with financial support from the RBC Blue Water Project and featured members of the external education team visiting Grade 7, 8 and 9 students in schools throughout Atlantic Canada. The mobile science program was delivered 85 times to 3,970 children and teachers at 25 schools throughout Nova Scotia, Prince Edward Island and Newfoundland and Labrador, and it received rave reviews from participants.

"In conjunction with our on-site water exhibit, the outreach program was designed to increase student awareness of environmental and scientific issues surrounding Canada's water resources," says Renée Fournier, Director of Business Development at the Discovery Centre. "The program also explored Canada's role on the world stage as a source for clean, drinkable water and the need to protect this valuable resource."

Like the permanent exhibit it was created to complement, the outreach program was extremely well-received by teachers and students alike. "We've been given this incredible opportunity to educate and empower these young people at a critical age when they're truly starting to define who they want to be in life," says Fournier. •

Programs dedicated to learning about water through ART OR EXHIBITS

5% OF PEOPLE ARE VISUAL LEARNERS

400% AMOUNT VISUAL AIDS IMPROVE LEARNING

OF INFORMATION THAT REACHES THE BRAIN IS VISUAL

Vancouver Aquarium

Museums and exhibits appeal to children's natural curiosity, which is why the Vancouver Aquarium's RBC AquaLab has been such a success. This two-part interactive program has given more than 3,500 students in Grades 4-12 the opportunity to explore the ecology of local sea animals and invertebrates.

Photos: Vancouver Aquarium

When Cirque du Soleil teams up with museums and galleries around the world to protect water, you're guaranteed an experience like no other. RBC's funding to ONE DROP enabled the creation of Aqua: A Journey into the World of Water. The exhibit uses massive 360° projections, digital screens with movement-based interaction, music and visual effects to create a spectacle that draws visitors in. Through ONE DROP in North America, RBC has provided \$1.26 million in funding for public education and engagement. See page 10 for more information on how ONE DROP uses artistic workshops to engage communities in crisis.

ONE DROP, Aqua

to della a file

Photos: ONE DROP

Granddaughter of undersea explorer Jacques Cousteau, Alexandra Cousteau has been a lifelong advocate for water.

Outdoor Adventurers

Water isn't just necessary for all life on earth; it's also a source of some of life's great pleasures, like swimming, boating, fishing and exploring.

Ready to dive in?*

23% of Canadians swim in lakes or rivers at least once per year

75% of Canadians are concerned about the water quality in the lakes and rivers where they swim

> * Statistics from the 2013 RBC Canadian Water Attitudes Study

In 2010, Alexandra Cousteau embarked on a 18,000 mile expedition across North America, where she and her team explored local water issues and helped raise funds for watershed protection organizations along the route. The RBC Blue Water Project sponsored the tour.

"When it comes to water issues, I think we have to help people really experience the stories and places we stand to lose," says Alexandra. "This expedition was about challenging people from all walks of life to explore these issues with us on a daily basis and connect with opportunities in their own community to make a very real and lasting difference in the watershed in which they live."

In order to share what she learned, Alexandra produced short films about a wide range of critical water issues on the Colorado River, the Gulf Coast, the Tennessee Valley, the Great Lakes and Chesapeake Bay.

Travelling in a biodiesel tour bus dubbed a "rolling Calypso" (an homage to the name of her grandfather's boat) Alexandra and her team produced and broadcast films, photos and findings to the world through the National Geographic Society's Freshwater Portal (also sponsored by the RBC Blue Water Project from 2009-2012).

"There's remarkably little we can do to shape productive conversation on water issues until we return to a simple truth we all learned as children: we share a single hydrosphere and are connected through the water cycle — each of us positioned quite literally downstream from the other. Water is the defining issue of our century." •



Passion for paddling

Often, conversations about water are shaped by serious topics like protection and conservation, so we sometimes forget the fact that water can be exhilarating and fun as well. No one knows that better than John Hastings, an Olympic kayaker and RBC Olympian.

"My livelihood is on the water. It is where I've had my greatest triumphs and most devastating failures," says John.

As a member of the Canadian National Kayak Team, John has travelled the world and witnessed first hand the many struggles associated with the world's supply of fresh water. "My passion for kayaking, and my goal for Olympic excellence, was fostered on the many rivers and lakes around the world, and to see them disappear would not only be devastating to me, but to the various communities that I have had the privilege to live in."

Smarts on the water

Are you a water lover? Do you know the exhilaration of an early morning swim in a picturesque lake? Of reeling in the catch of the day with your best friend?

Unfortunately, these time-honoured outdoor activities are no longer carefree. Increasingly, people find themselves asking, "Is the lake safe for swimming?" "Is that fish safe to eat?" "Is the water safe to drink?"

Lake Ontario Waterkeeper is working to provide Canadians who love the outdoors with timely, accurate answers.

The group has created the Waterkeeper Swim Guide and Waterkeeper Drink Guide — electronic "roadmaps" that provide detailed, at-a-glance information on the quality of beaches and drinking water supplies. Users of the guides are immediately connected to a map of all beaches in their area, comprehensive water quality information and information about drinking water advisories.

The guides also educate the public about the causes of pollution and the urgent need for action to clean up local water sources.

The Waterkeeper Swim Guide and Waterkeeper Drink Guide were developed with a grant from the RBC Blue Water Project and currently include information about four watersheds: Lake Ontario, the Fraser River in British Columbia, the North Saskatchewan River and Biscayne Bay in Miami, Florida.

There's also a Waterkeeper Fish Guide in development. And eventually, the guides will be expanded to include watersheds across North America.

Expeditions head north

Every year, the Royal Canadian Geographic Society sends out explorers to expand its knowledge of the country's geography. In 2010 and 2011, RBC tagged along — well, in spirit, at least. That's because we helped fund two "Expeditions of the Year" to explore fresh water issues in Canada's far north.

The 2010 Expedition examined permafrost conditions in Canada's far north, vulnerable to the effects of climate change and with an impact on fresh water. "It's only by doing this kind of long-term project that we will get the answers concerning how fast permafrost will thaw," says Antoni Lewkowicz, explorer. "The Society and the RBC Blue Water Project are investing in work that will carry on for a long time."

The 2011 Expedition was a 165-day, 7,000-km canoe trip to raise awareness of the importance of Canada's fresh water resources. RBC's support for the Royal Canadian Geographical Society also covered a photo contest and the production of online and printed maps of Canadian watersheds and lesson plans for teachers on watershed protection.

Royal Canadian Geographic Society explorer Christina Miceli on a buckling highway caused by a landslide in the southern Yukon, on a 2010 expedition to explore melting permafrost.

Photo: Royal Canadian Geographic Society The Cross Canada Canoe Odyssey 2011 was born out of a passion for paddling, fuelled by a lust for adventure and funded by RBC.

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Craig and Marc Kielburger's passion for creating change has infused hundreds of thousands of people of all age groups with contagious enthusiasm.

Catalysts

Where would we be without the catalysts those individuals with the courage to challenge conventional thinking and change the status quo?

We celebrate all the catalysts who energize, mobilize and motivate those around them to create positive,

long-lasting change for the world's water.

\$25 million

TO ORGANIZATIONS DEDICATED TO CHANGING WATER BEHAVIOURS Throughout the first five years of the RBC Blue Water Project, we've had the privilege of collaborating with a number of individuals and organizations that truly embody the spirit of being a catalyst. One of them is Craig Kielburger.

When Craig co-founded Free The Children in 1995 at the age of 12, he ignited a generation.

In June 2010, Free The Children kicked off H2O 4U, a water-focused motivational youth speaking tour that visited almost 200 middle and high schools across Canada. Students were encouraged to raise funds for people in water-stressed regions such as India and Kenya and, at the same time, learned about water issues in Canada. RBC jumped on board to support H2O 4U with donations of \$730,000.

In 2012, we extended our relationship with Free The Children as a major sponsor of We Days: a series of stadium-sized, celebrity-filled youth empowerment events that encourage young people to make a difference in the world. Our sponsorship helped Free The Children mount We Days right across Canada, attended by more than 100,000 youth.

In 2012, RBC partnered with Free The Children on *We Create Change*, a national penny drive in support of Free The Children's year-long Water Initiative to provide a permanent source of clean water to 100,000 people in developing communities around the world.

Water programs we've funded for catalysts

A river's rebirth

Every year, millions from around the world trek to Alberta's picturesque Banff National Park to enjoy the breathtaking landscape provided by the 623-kilometre Bow River, which is not only home to a stunning array of wildlife, but also provides drinking water for residents of Calgary.

Things haven't always been idyllic. In 1989, a toxic "blob" was discovered in the Bow River. The plume, which originated from a defunct wood-preserving plant, posed a serious threat to water quality and safety. In response, in 1992, government officials created the Bow River Basin Council.

This change-making organization is vigilant in its mission to protect and improve the water quality of the Bow River, and they're now facing a new threat — increased development in the region.

The Council's members are realists: they know that growth and development will happen. Their goal is to make sure that development occurs in a manner that's sensitive to the integrity of the river, and they're creating strategies to influence regional development decisions.

With funding from the RBC Blue Water Project, the Council created sophisticated computer models to illustrate what the river will look like if best environmental practices are incorporated into development plans — and the problems that may await if they are ignored. Unlocking this data is a critical piece of the puzzle, for it allows the group to focus its efforts in the most important areas.

"The Bow River plays a vital role in our community," says Council Executive Director Mark Bennett. "Our goal is to act as a change agent and ensure families will be able to continue enjoying this important water source for generations to come." North Carolina State University

In 2007, a serious drought resulted in such low water supplies in Alabama, Georgia and the Carolinas that many municipal services were threatened or eliminated. Funded by RBC, the Water Resources Research Institute at NC State University engaged municipalities, elected

officials and professional water managers to collaborate and bring change to water demands in the area.

Waterlution

Change doesn't happen overnight. That's why Waterlution created the Future of Water Workshop Series, an innovative program funded by RBC that encourages young leaders to find solutions to water problems through collaboration with business, government and

water experts. To date, the series has connected more than 1,500 passionate Canadians and water leaders.

Forum for Leadership on Water

In 2010, RBC provided funding so this group of water experts could scope out a new water strategy for the North, resulting in a discussion series that visited 17 Canadian cities to build awareness around the need for improved fresh water protection. The series offered a unique

north-south opportunity to identify, discuss and compare the concerns and issues related to water resources management, with 750 participants including 36 partner organizations.

Canadian Freshwater Alliance

A \$300,000 grant from the RBC Blue Water Project helped establish the Canadian Freshwater Alliance, providing support and resources to watershed protection organizations. RBC also funded the CFA's first workshop, which brought together more

than 80 organizations from across the country for peer learning and skill building.

In 2009, RBC became a founding partner of the multi-year National Geographic Freshwater Initiative. Sandra Postel, a renowned water expert and author, was appointed to lead the initiative. Since then, she has served as a true change agent, spearheading the impressive growth of the initiative across all National Geographic divisions, and inspiring everyone who meets her.

Collaborators

Protecting our water is a responsibility shared by individuals, communities, governments, academia, not-for-profits and the private sector. And when they decide to collaborate with each other? Truly amazing things can happen.

COLLABORATIVE PROJECTS FUNDED TO DATE (TWO OR MORE ORGANIZATIONS

PARTNERING)

Nearly three-quarters of the Earth's surface is covered in water. Yet lack of access to clean, fresh water is one of the most significant humanitarian, environmental and economic issues facing our world today. Given the vastness of the world's water supply and the sheer complexity of its water-related challenges, it's unrealistic to think any single organization could ever hope to solve these problems on its own.

We recognize how vital collaboration is to the long-term health and sustainability of our planet's precious water supply. That's why the RBC Blue Water Project actively seeks out and supports initiatives where stakeholders from different groups, sectors and countries come together with a singular purpose.

In this section, we shine the spotlight on just a few of these bridge builders — those truly special people and organizations that possess the foresight, the boldness and the courage to see beyond their respective comfort zones and dare to change the world through collaboration.

Water programs we've funded for collaborators

Teamwork harnesses drinking water from the sky

Imagine turning on the tap but instead of getting clean water, there is nothing. No water for drinking, cooking or bathing.

For many families in the Caribbean, this is a daily occurrence, causing emotional stress and putting citizens at risk of disease. "Sometimes there's no water for weeks," says Dianne Wells, Project Coordinator for Water for Life: The Trinidad and Tobago Initiative.

Some communities get water trucked in. But deliveries are infrequent and distribution methods aren't always fair. "The lack of water can lead to tense, conflict-oriented communities," says Wells.

Thanks to the collaborative efforts of approximately 20 public, private and NGO stakeholder organizations, area families are getting the education and the tools they need to harvest and store their own clean water. The RBC Blue Water Project-funded initiative was spearheaded by the Institute for Public Health and Water Research (IPWR).

The project's success is due in large part to the contributions of partners such as the Texas A&M Health Science Centre (which provided health and sanitation expertise), the Global Water Partnership — Caribbean (which introduced a re-engineered rainwater harvesting model) and the Water and Sewerage Authority of Trinidad and Tobago (which validated and approved the system) to mention just a few.

The systems have helped more than 150 families get improved access to water, which helps to keep these communities alive, functional and healthy.

"RBC should take a bow for acting as a catalyst for this collaborative project that's using rainwater as a sustainable component to help these communities in Trinidad and Tobago," says Wells. "It's resulting in so many benefits."

Photo: IPWR

Thanks to collaboration between a number of stakeholder groups, families in Trinidad and Tobago are learning how to harvest and store their own clean water.

City of Bathurst

The City of Bathurst joined forces with Bathurst Sustainable Development and the New Brunswick Environmental Trust Fund to develop a water-use awareness campaign. The city mailed water audits to residential and business customers, with the incentive to return the audit

fully funded by RBC. To date, more than 350 audits have been returned and more than 10,000 community members have been engaged, almost one-third of the city's population.

Sierra Club Canada Foundation

Translating water planning research into an education program for a public that has no environmental

background requires a certain flare for communication. With funding from RBC, Action H2O (an initiative of the Sierra Club Canada Foundation) educated local groups about water conservation plans. The program ran more than 50 events and workshops across Canada, bridging the gap between research and community implementation to address water conservation concerns.

Wildsight

Wildsight, the Lake Winnipeg Foundation and Global Nature Fund launched Living Lakes Canada in 2010 with the help of RBC. Living Lakes Canada helps grassroots water stewardship programs across Canada develop partnerships and collaborate. The model has

been used as a template to support projects for 15 other lakes in Canada. Since 2010, 87 members of community and industry groups have been trained in federally recognized water-monitoring protocols.

Manitoba Habitat Heritage Corporation

How do you effectively monitor 26,850 km² of watersheds to evaluate which projects are most likely to produce the greatest benefit? Collaboration. Using a new computer planning tool funded by RBC, MHHC has successfully built relationships with four watershed

conservation districts in Manitoba to help identify the highest value stewardship projects and priority source-water sites.

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Our Clients

As a financial services company, RBC serves clients around the world who are developing innovative solutions to the world's water challenges. The RBC Blue Water Project is a \$50 million commitment to giving grants to charitable organizations. And while philanthropy is an important element of our approach, RBC goes beyond grants to help protect the world's precious water resources.

For example, our Knowledge-Based Industries (KBI) group works with innovative companies that are developing solutions to the world's water challenges.

One of those companies is Toronto-based XPV Capital Corporation, a unique venture capital firm that focuses exclusively on emerging water technology companies. The firm invests in technologies or water-related businesses that address the transformation taking place in the way we produce, manage and use water. Their singular focus is reinforced by their tagline: "Making a difference in water."

RBC provides XPV Capital with a full range of treasury management services and credit facilities that help fund the firm's day-to-day operations. In addition, RBC's close working relationship with XPV Capital provides increased visibility in the cleantech community and continues to help pave the way for new client introductions in the water technology sector.

"We chose RBC to be our banking partner based on the company's track record and commitment to water, cleantech and the broader venture capital sector," says David Henderson, Managing Director, XPV. "They have the advantage of understanding the global water challenges and opportunities that are now affecting all economies, corporations and life on our planet. This knowledge will help RBC better serve and work with investors, customers and suppliers that are facing risks and opportunities in their own day-to-day activities. We are excited to grow our portfolio of water technology companies along with RBC as we both pursue the vision of 'making a difference in water."

Waste not, want not

Since 1991, Monteco has been identifying early-stage, leading clean technologies and bringing them to the marketplace. The Toronto-based company operates a number of business units, focused in one way or another, on water.

"We were into water and the environment long before it was cool," says Scott Monteith, the company's president and chief executive officer. "When we told people the business we were in, they looked at us like we were crazy."

More than two decades later, Torontobased Monteco runs a portfolio of companies providing a range of specialized water-related services. Green Turtle provides wastewater pre-treatment solutions for commercial, institutional and industrial clients. Imbrium Systems designs and sells stormwater treatment products to protect water from pollutants. And Filamat Composites provides equipment to the water industry, with products used by a wide range of industries.

"We're in the business of water," says Monteith. "In the old paradigm, people treated water as waste. We look at it as a resource." The company also extracts fats, oil and greases from restaurant effluent to turn it into biodiesel through a company called BIOX, Canada's largest biodiesel refinery.

"There's a finite amount of clean water that's naturally available," says Monteith. "We have a responsibility to protect it. And we will continue to bring new technologies to market that help us pursue this goal."

RBC has a clear role in ensuring that our lending and investment banking activities are subject to appropriate environmental due diligence.

A cleaner, greener way to unlock Canada's oil sands

Canada's oil sands are home to approximately 177 billion barrels (or 70.8 per cent) of the world's natural bitumen reserves. However, traditional steam-based methods of extracting bitumen from the oil sands are extremely energy- and water-intensive.

A company called Switchable Solutions is looking to change all that. The company has developed a unique, energy-efficient and environmentally friendly solvent technology for extracting bitumen from the oil sands. "Our claim to fame is that we have a technology that operates without the energy-intensive distillation, making solvent-based extraction economically plausible for bitumen extraction," says Mark Badger, the chief executive officer of the company, which has been an RBC client since being founded in 2011.

Switchable Solutions estimates its system can operate on roughly half the energy of the traditional method and uses up to 80 per cent less water. "And with less fluid going through the system, our technology has the potential to virtually eliminate the use of tailings ponds. Our process has the potential to save our clients money, and it's good for the environment," says Badger. •

Photos: iStock

Risk management

Financial services companies must carefully balance environmental concerns, society's needs and economic opportunity by providing credit responsibly to all sectors. We have a very clear role in ensuring that our lending and investment banking activities are subject to appropriate environmental due diligence.

We strive to understand the waterrelated risks and opportunities facing our clients, especially if their operations have a significant impact on water supply or quality. If a large corporate client relies heavily on water or operates in regions where water is scarce, we expect them to have plans to minimize water consumption or mitigate any production risks associated with interrupted access to water.

Clients can also have an impact on water quality through their operations, so we expect them to take meaningful steps to protect the quality of water in the regions where they operate. In the case of propertyspecific financing, we take into account the extent to which a client's operations have affected soil, groundwater and surface water.

Our water footprint

RBC doesn't use a lot of water in our operations, but we strive to make sure we are using water as efficiently as possible:

- We encourage the use of tap water at all RBC events.
- We've pledged to reduce the use of landscape irrigation around our properties in water-stressed regions.
- We incorporate water-efficient technologies in our new properties and in properties we're renovating.
- Our janitorial and cleaning services use environmentally responsible cleaning products to help protect water quality.

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Water and the Economy

Bilexys was the winner of the 2011 Imagine H2O competition sponsored by RBC.

There is a bubbling current of conversation about the economic implications of water in boardrooms and on seats of government around the world, because without water, there would be no economy.

COST TO MEET WATER AND WASTEWATER INFRASTRUCTURE NEEDS GLOBALLY

2.6 tri//

Water plays a critical role in the world's key economic sectors, from agriculture and food processing, to oil and gas production, to semi-conductor manufacturing. Water literally fuels the economy.

Imagine the business opportunities

Ever heard of a company that converts sewer sludge into watts? Or one that harnesses the force of water pressure to generate power for a facility, or turns sewer treatment centres into power sources? These aren't just clever ideas; they're all bona fide businesses discovered and supported by Imagine H2O, a global organization spurring solutions to water challenges by advancing entrepreneurship and innovation. The organization's annual business plan competition and accelerator program helps entrepreneurs turn their plans into game-changing real-world solutions.

The RBC Blue Water Project was a founding sponsor of this global competition for water innovation from 2009 to 2012.

"The RBC Blue Water Project made an early commitment to our global conduit for water entrepreneurship and innovation," says Scott Bryan, chief operating officer of Imagine H2O. "Today, we're recognized as a leading path-to-market resource by entrepreneurs with promising solutions for the world's water challenges."

Winner of the 2011 Imagine H2O Competition, sponsored by RBC, Bilexys is a spinoff company from the University of Queensland's Advanced Water Management Centre, which partnered with Carlton United Brewery to develop and test their wastewater technology. Bilexys approaches wastewater treatment as an opportunity to biologically convert the organics within wastewater into high-value chemical products.

* OECD

Canadian Water Summit

When we first launched the RBC Blue Water Project, we were invited to sponsor a host of conferences on the topic of water protection. But there weren't many conferences dedicated unlocking Canada's potential for being a world leader in water expertise, management and innovation. Enter the Canadian Water Summit, sponsored by the RBC Blue Water Project from its inception to 2012.



RBC released "Water and the Future of the Canadian Economy," a report from the first Canadian Water Summit, providing an overview of the role water plays throughout the Canadian economy, approaches for bridging the gap

between research, policy and

management practices, and strategic areas where creative, proactive intervention can position Canada as a progressive and influential voice for addressing water issues.

Both the Summit and Report are critical inputs in an important dialogue about the contribution water makes to Canada's prosperity. As a financial services company, we see both risk and opportunity in water. We need to understand when and how our clients' businesses might be constrained by water issues, and we expect to see exciting business opportunities for Canadian companies in the water-tech sector.

Students in Free Enterprise

A thousand enthusiastic university students packed a convention hall in Calgary, Alberta, to see Acadia University crowned the 2010 SIFE RBC Blue Water Challenge National Champion by national charitable organization Advancing Canadian Entrepreneurship (ACE). The RBC Blue Water Project sponsored this national competition that challenged six university teams to develop innovative solutions related to water sustainability while also creating economic value. Teams were asked to focus on the benefits related to responsible water usage and the opportunity that exists to make or save money through these initiatives.

The team from Acadia developed a prototype water bottle refill station intended to replace bottled water on campus and planned to install over 30 of them in every building including residence.

Blue Economy Initiative

In 2011, the RBC Blue Water Project joined forces with Canada's most experienced funder of water organizations and the nation's leading water research network in a two-year venture to build a business case for water sustainability. We dubbed this the "Blue Economy Initiative," through which we hope to provide factual information about the economic benefits of protecting Canada's fresh water and the economic risks of neglecting the health of our watersheds. Our intention in providing this information is to catalyze well-informed water management and policy decisions.

WATER BY 2050*

+55% IN DEMAND GLOBALLY

+400% IN DEMAND FROM MANUFACTURING

+140% IN DEMAND FROM THERMAL ELECTRICITY GENERATION



Our New Direction

Urban Water Issues

By 2050, 75 per cent of the world's population will live in cities. This will significantly increase the strain on water resources.

Keeping our precious water clean as it flows through urban areas and ensuring there is enough water for the droves of people who are moving to our cities are urgent

issues that we cannot ignore.



When we launched the new RBC Blue Water Project in 2007, we decided to support two very broad areas: watershed protection and access to clean drinking water.

We felt that by casting such a wide net, we could get to know the fullest range of people and organizations working to protect water, fast track critical funding to a variety of national, regional and community-based projects around the world and learn as much as we could about water. At the same time, we also wanted to help raise awareness about water issues among our employees, clients and the communities we serve.

We're confident we've made good progress on these goals, having provided over \$36 million in grants to more than 500 organizations around the world. But even with \$50 million, we knew we couldn't solve all of the pressing water issues in the world.

We're now at the half-way point of our 10-year project. We're committed to redirecting our remaining funding to helping address a significant, emerging issue.

Most of the world's population now lives in towns and cities, and this has significantly increased the strain on water resources in these areas. Keeping our precious water clean as it flows through urban areas and ensuring there is enough water for the droves of people who are moving to our cities are urgent issues that we cannot ignore.

Moving forward, we'll work to protect and restore urban waterways by funding projects that improve control and management of stormwater or rainwater, raise awareness about or use low-impact design or natural systems to control stormwater or rainwater, and encourage more efficient use of water.



Giving an iconic river a new lease on life

It served as the backdrop to the signing of the Magna Carta. Julius Caesar wrote about it in his second expedition to Britain in 54 BC. It's been immortalized by artists.

But the River Thames, which cuts through one of the most densely populated cities in Europe, is also treated as a dumping ground. Garbage. Shopping carts. Animal bones. Even raw sewage. These are just a few of the pollutants that have been threatening wildlife and the human population, which depend on the river for drinking water, food and leisure activities.

A small group of volunteers stepped forward in the mid-1990s to take action. Today, Thames21 is one of the world's largest environmental charities and is helping restore the Thames.

Last year, 15,000 volunteers took part in the group's cleanup efforts. "The people of Greater London are passionate about this river, and we're all committed to ensuring we can use it for generations to come," says Chris Coode, Senior Program Manager for Thames21.

Now, with help from the RBC Blue Water Project, Thames21 is preparing to expand their restoration and revitalization efforts well beyond the city of London. Organizers envision a future in which the entire 346 kilometre-long river is transformed from a neglected, litter-strewn waterway into a clean, vibrant river that people are proud to call their own.

"Thanks to the RBC Blue Water Project, people from all walks of life will once more be able to truly enjoy this iconic river in their own backyard," says Coode. "The Thames is the heart of our community, and we're more committed than ever to restoring it to its former glory."

'Glades of glory

One in three Floridians rely on the Everglades for their water supply. But this massive, complex ecosystem is in desperate need of repair.

"The Everglades provides water for seven million people. But it simply doesn't get the amount of water it once received from its head water supply," says Dr. Stephen Davis, Wetland Ecologist with the Everglades Foundation. "Much of the water is also heavily polluted by agricultural and municipal runoff before it even enters the Everglades." Left unchecked, the deterioration of the Everglades will spell serious problems for south Floridians.

The Everglades Foundation directed its RBC funding towards participation in the ambitious Central Everglades Planning Project (CEPP), aimed at "re-plumbing" the Everglades. CEPP is a project of the U.S. Army Corps of Engineers and its non-federal partner, the South Florida Water Management District. The Everglades Foundation is playing an active role in what is an intensive process, one of several Corps planning projects designed to shorten its traditional multi-year process into an 18-month period.

"This is an attempt to restore the heart of the Everglades," says Davis. The project's bold plans include improving water flow, designing marshes to both store and clean water and restoring the function of impaired wetlands and agricultural lands.

"The more water we're able to put into the aquifer, the more we can sustain the water supply," says Davis. "Our vision is that the Everglades will be restored to a natural state that allows clean water to flow for environmental restoration,

while providing a reliable water supply source for the millions of Floridians who depend on it." •



Plant some green, save some blue

One of the leading causes of water pollution and flooding in cities is stormwater runoff. The problem is all those paved surfaces.

When cities are hit by heavy rain or snow melt, the ground can't absorb all that water slowly, the way it does in fields and forests. Instead, the excess water races down paved surfaces, picking up pollutants as it heads down storm drains, sometimes right into the nearby river or lake that provides city residents with drinking water. Overloaded stormwater systems can also cause flooding, a leading cause of property damage.

One of the best ways that individuals can help protect water in urbanized areas is by getting rid of paved surfaces and planting some greenery.

That's the message from the spectacular show gardens we have sponsored at three successive RHS Chelsea Flower Shows (2011 to 2013). These gardens were designed to demonstrate how homeowners and gardeners can help protect water, while creating lasting beauty. Visitors to the RBC Blue Water Gardens have learned how to plant a rain garden, how to incorporate bioswales into their landscaping and how to plant a drought-tolerant roof garden.

More than 50 employees from across Greater Toronto participated in tree planting, restoration and an educational hike at the Sunkist Woods in Bolton, Ontario.

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Ripple Effect: Our Impact So Far

In 2011-2012, we commissioned the Monitor Institute to evaluate the social and environmental impacts of the RBC Blue Water Project to date. Monitor surveyed a cross-section of about 20 per cent of our grant recipients and developed a small subset of metrics that were common across most of the initiatives we funded. Monitor found that:

- **3 million** North American households were positively affected by programs funded by RBC.
- Nearly 2.5 million kilolitres of water were conserved through programs funded by RBC.
- More than **810,000 people** attended service/training opportunities with organizations funded by RBC.
- **80,000 people** logged over **400,000 hours** volunteering with community-based watershed protection programs funded by RBC.

One of our goals with the RBC Blue Water Project is also to help create capacity in the charitable water sector.

RBC has a reputation for integrity and due diligence in our grant-making processes, and over the years, many charitable organizations have told us that RBC funding is often considered a de facto "seal of approval," allowing them to attract additional funding from other donors more easily. The Monitor study revealed that more than 80 organizations in North America were able to leverage their RBC Blue Water Project grants to acquire more than \$4.7 million in additional funding, an average of \$50,000 per organization. **"The Blue W**

"Our project would have been dead in the water without the Blue Water Project." "The Blue Water grant helped us buy a seat at the table by giving us a level of credibility only a global brand could provide."





supporting such a vital issue that faces our society today. I commend RBC for thinking not just about the present, but also about future generations."



Advisory Panel

When we launched the RBC Blue Water Project back in 2007, we weren't what you would call water experts. But with a commitment of \$50 million, the largest in our company's history, we knew we needed to ensure we were providing grants to the best programs and organizations out there. We also knew we couldn't do it alone.

So we called in the experts.

In early 2008, we convened the RBC Blue Water Project Advisory Panel, seven of North America's most renowned water experts, to provide us with expertise, opinions and guidance. In five years, they reviewed hundreds of grant applications on our behalf, and helped us ensure that our grants went to credible organizations for programs that would have a real impact on water.

We've learned a lot about water since then, and we count ourselves fortunate to have such a committed, passionate panel of experts we now call friends.

Rob de Loë (Chair, 2008-2013) David Brooks (member, 2008-2013) David Moreau (member, 2008-2013) Merrell-Ann Phare (member, 2008-2013) George Yap (member, 2008-2013) Robert Sandford (member, 2010-2013) Anna Warwick Sears (member, 2012-2013) Tom Siddon (member, 2008-2012) Danielle Droitsch (member, 2008-2010)



