

Issue 204 | August 28, 2015 | Focus on WASH & Innovation

This issue features some of the many innovative water supply, sanitation, and hygiene (WASH) programs, products, and services that are currently underway. Please contact WASHplus if you have other innovative resources that we can include in a future issue on innovation. Included are resources from WASHplus, the Global Public-Private Partnership for Handwashing, USAID, DFID, and others. Also included are recent videos on sanitation in floating communities, information on Shit Flow Diagrams, the SlingShot water purification system, sanitation innovation through design, and innovative financing methods.

WASHPLUS | GLOBAL PUBLIC-PRIVATE PARTNERSHIP FOR HANDWASHING | USAID RESOURCES

Breaking the Cycle: Small Doable Actions in WASH to Improve Child Health. J Rosenbaum, WASHplus; FHI 360. Video

WASHplus's Julia Rosenbaum discusses the power of small doable actions in WASH programs. This approach to behavior change encourages households to adopt feasible actions and enabling technologies to move them toward ideal hygiene and sanitation practices.

Handwashing and the Science of Habit Webinar, 2015. Webinar

USAID/WASHplus and the PPPHW co-hosted a webinar with David Neal, Ph.D., from Catalyst Behavior Sciences and the University of Miami. In this webinar, Dr. Neal emphasized ways to apply the basic science of habit and behavior change to real world health interventions and program delivery, with a focus on behavior change for handwashing with soap.

USAID Development Innovation Ventures (DIV). Website | Ensuring Access to Safe Water

DIV is an open competition supporting breakthrough solutions to the world's most intractable development challenges—interventions that could change millions of lives at a fraction of the usual cost. The Ensuring Access to Safe Water section of the DIV website has summaries of three projects: Bringing Safe Water to Scale, Monitoring Clean Drinking Water through Technology and Open Data, and Making Water Filtration Affordable for Kenyan Households.

WORLD WATER WEEK 2015 RESOURCES

Financing for Development: Innovative Financial Mechanisms for the Post-2015 Agenda. World Water Week 2015. <u>Video</u>

This session discusses how to generate an enabling environment and targets questions such as: What innovative financing mechanisms must be developed to achieve the water-related Sustainable Development Goals? What are the existing strategies already addressing this issue? What can we learn from other sectors and regions?

Vote for Your Favorite Water Idea, 2015. <u>Link</u>

As part of World Water Week 2015, people can vote for one of ten innovative ways to conserve and manage water resources.

DFID RESOURCES

Can Innovation Prizes Help Address Water and Sanitation Challenges? 2015. S Trémolet. <u>Link</u>

This paper helps identify how innovation prizes can be used to address intractable issues in the WASH sector. It also presents a number of areas where innovation prizes could be used to either trigger genuine innovation or promote scaling up of existing innovations in the WASH sector.

Can Innovation Prizes Help Address Water and Sanitation Challenges? 2015. Video Ideas to Impact WASH Theme Leader Sophie Trémolet introduces the WASH prize concept. The Ideas to Impact program has developed a four stage guide to assess whether and how prizes will be effective in particular contexts. Using this guide as a framework, we undertook a broad review of the WASH sector to identify unresolved challenges that could potentially be overcome with the help of innovation prizes.

Case Study: Innovation in Water, Sanitation and Hygiene, 2015. H Rush, DFID. Link To help us understand the WASH innovation ecosystem, we use two main conceptual frameworks. The first is an idealized model of the system dynamics of innovation, identifying the different stages and activities typically involved in innovation (recognition of need, generation of new ideas, creation of plausible inventions and solutions, development and implementation of potential innovations, and diffusion of innovations). The second, which we refer to as the Rs framework, seeks to uncover the detailed factors influencing how this system operates using the following headings: resources, roles, relationships, rules, routines, and results.

VIDEOS

Introducing Sanitation in Floating Communities, 2015. Video

Wetlands Work! Ltd. has created the HandyPod that addresses wastewater treatment for individual houses in floating communities in Cambodia and elsewhere.

"SlingShot": How an Innovation Mindset Can Change the World. Getting Smart, July 2015. B Lathram. Video

The award-winning film "SlingShot" focuses on Dean Kamen and his work to solve the world's water crisis. Kamen invented the Segway, and and his latest passion is the SlingShot water purification system, created to obliterate half of human illnesses on the planet.

The Need for Urgent Innovation in WASH, 2015. Video

In this TEDx Talk Konda Vishweshwar Reddy shares his experiences with some of the best innovations in the WASH field. However, he found that most innovative designs had some

local or cultural constraints.

Innovation in Urban Sanitation: FaME and U-ACT Research in Sub-Saharan Africa, 2015. SANDEC EAWAG. Video

In sub-Saharan Africa sanitation needs of the majority of the urban population are met by onsite sanitation technologies. These technologies can provide sustainable and more affordable sanitation compared to sewer-based systems. The FaME (Faecal Management Enterprises project researched innovative solutions to increase access to sustainable sanitation services.

Jasmine Burton – Innovation to Sanitation through Empathic Design, 2015. <u>Video</u>. Driven by a passion for serving others, Jasmine Burton not only sought a path to an education, but also a path to becoming a humanitarian for developing nations. Through the social impact organization, Wish for Wash, Jasmine is bringing innovation to sanitation through empathic design. In 2014, she and Team Sanivation won the GT InVenture Prize for their innovative and affordable mobile toilet product design, SafiChoo.

Bindeshwar Pathak – Technological Innovations Made the Difference in the Lives of Untouchables, 2015. Video

Dr. Pathak, sanitation crusader, has contributed to solving problems of open defecation and removing the inhuman practice of manual scavenging associated with untouchability by inventing appropriate, affordable technology for household toilets with minimum water use that dispenses with manual scavenging. He maintains 8,000 self-sustaining "pay and use"—based public toilets and was awarded the Padma Bhushan and Stockholm Water Prize for his work.

US Envoy Applauds Sulabh's Innovative Efforts to Improve Sanitation, 2015. <u>Video</u> US Ambassador to India Richard Verma visits the headquarters of Sulabh International to witness the award-winning organization's innovative sanitation and behavior change work.

BLOG POSTS | COMPETITIONS | OTHER RESOURCES

Shit Flow Diagrams (SFDs) Website. Link

SFDs are a new way of visualizing excreta management in cities and towns. SFDs show how excreta is or is not contained as it moves from defecation to disposal or end-use, and the fate of all excreta generated. An accompanying report describes the service delivery context of the city or town.

SFD (Shit Flow Diagram) Promotion Initiative. Link

This library entry contains background documents and results for a grant which is funded by the Bill and Melinda Gates Foundation and led by Arne Panesar.

World Design Impact Prize 2015-2016. Website

The World Design Impact Prize recognizes and encourages industrial design-driven projects that benefit society and reflect the expanded field of industrial design. Nominated projects in the WASH sector include:

- <u>Happy Tap</u> The HappyTap is the first ever mass-produced handwashing device that is not only affordable but children love to use.
- <u>eSOS Smart Toilet</u> The eSOS smart toilet is in the heart of the novel eSOS
 (emergency Sanitation Operation System) concept that offers sustainable, innovative,
 holistic, and cost-effective sanitation solutions for emergencies.

- Warka Water Warka Water is an alternative water source designed to serve rural populations located in isolated regions where conventional pipelines and infrastructure will never reach and where water is not available from wells.
- <u>Sanir Community Sanitation Centres</u> The Sanir Community Sanitation Centres and Water Diverting Toilets try to answer this challenge especially for densely populated informal settlements. CSC toilet waste is dried, converted to syngas, and fed into a fuel cell.
- <u>LifeStraw® Community</u> LifeStraw® Community is a high-volume water purifier with built-in safe storage that converts microbiologically contaminated water into safe drinking water.

Five Innovative Projects Promoting Menstrual Hygiene Around the World. *Positive News*, Aug 2015. <u>Link</u>

Menstrual hygiene continues to be one of the most pressing issues facing women in developing countries. Here, Thorsten Kiefer looks at five innovative program around the globe that aim to raise awareness.

An Innovative Solution to Menstrual Hygiene in Developing Countries. Fastcodesign, Aug 2015. M Miller. Link

Flo is a kit for washing, drying, and storing sanitary pads. It includes a detachable device used for spinning the pad dry and hanging it up in privacy, as well as a pouch for transporting.

Could This "Drinkable Book" Provide Clean Water to the Developing World? Smithsonian Magazine, Aug 2015. K Nodjimbadem. Link to article | Link to The Drinkable Book |

The Drinkable Book's pages are infused with bacteria-killing silver nanoparticles and is a patent-pending water purification system. Silver nanoparticles release silver ions, which render disease-causing microbes that get near them inactive, explains John Tobiason, professor of environmental engineering at the University of Massachusetts Amherst.

WASHplus Weeklies highlight topics such as Urban WASH, Household Air Pollution, Innovation, Household Water Treatment and Storage, Handwashing, Integration, and more. If you would like to feature your organization's materials in upcoming issues, please send them to Dan Campbell, WASHplus Knowledge Resources Specialist, at dacampbell@fhi360.org.



About WASHplus - WASHplus, a multi-year project funded through USAID's Bureau for Global Health, supports healthy households and communities by creating and delivering interventions that lead to improvements in access, practice and health outcomes related to water, sanitation, hygiene (WASH) and household air pollution (HAP). WASHplus uses at-scale, targeted as well as integrated approaches to reduce diarrheal diseases and acute respiratory infections, the two top killers of children under five years of age globally. For information, visit www.washplus.org or email: contact@washplus.org.