



US EPA Stormwater Program's Webcast Series

Stormwater 101: The Basics



Essential Resources for the Stormwater Program

Program Planning and Performance

- EPA's Measurable Goals Guidance, www.epa.gov/npdes/stormwater
- California Stormwater Quality Association's Municipal Stormwater Program Effectiveness Assessment Guidance, www.casqa.org (\$30.00)
- EPA's Stormwater Webcast on Municipal Program Effectiveness www.epa.gov/npdes/training
- EPA's MS4 Program Evaluation Guide, www.epa.gov/npdes/stormwater/municipal
- Center for Watershed Protection's Smart Watershed Benchmarking Tool, www.cwp.org

BMP Performance

- EPA's Urban BMP Performance Tool, www.epa.gov/npdes/urbanbmptool
- EPA's BMP Performance webcast, www.epa.gov/npdes/training
- International BMP Database, www.bmpdatabase.org
- Center for Watershed Protection's National Pollutant Removal Database, www.cwp.org/PublicationStore/special.htm (free)

Illicit Discharge Detection and Elimination

- Center for Watershed Protection, IDDE Manual, www.epa.gov/npdes/idde or www.cwp.org
- EPA Webcasts on IDDE, www.epa.gov/npdes/training

Post-Construction

- Center for Watershed Protection's Post-Construction Manual, coming July 2008
- Center for Watershed Protection's Urban Stormwater Retrofit Manual, www.cwp.org
- EPA Webcasts on Post-Construction, Smart Growth, Low Impact Development, www.epa.gov/npdes/training
- EPA's National Menu of BMPs, www.epa.gov/npdes/menuofbmps
- EPA's Urban Management Measures Guidance, www.epa.gov/owow/nps/urbanmm
- Water Environment Research Foundation's Using Rainwater to Grow Livable Communities, www.werf.org/livablecommunities
- Washington State's Low Impact Development – Technical Guidance Document for Puget Sound, www.psp.wa.gov/downloads/LID/LID_manual2005.pdf

Construction Site Management

- EPA's Developing Your Stormwater Pollution Plan – A Guide for Construction Sites (Guide, Templates, and Example SWPPPs), www.epa.gov/npdes/swpppguide
- EPA Webcasts on Construction and SWPPPs, www.epa.gov/npdes/training
- Construction Industry Compliance Assistance Center, www.cicacenter.org
- California Stormwater Quality Association Handbook on Construction, <http://www.cabmphandbooks.com>
- Kentucky Erosion Prevention and Sediment Control Field Guide, www.water.ky.gov/permitting/wastewaterpermitting/KPDES/storm
- Minnesota Stormwater Construction Inspection Guide, www.pca.state.mn.us/publications/wq-strm2-10.pdf

Public Education, Outreach, and Involvement

- EPA's Getting In Step, A Guide for Conducting Watershed Outreach Campaigns, www.epa.gov/owow/watershed/outreach/documents
- Getting In Step, Engaging and Involving Your Stakeholders, www.epa.gov/owow/watershed/outreach/documents
- EPA Webcasts on Stormwater Outreach, www.epa.gov/npdes/training
- EPA's Nonpoint Source Outreach Tool Box (collection of 800+ newspaper, tv, radio ads, posters, brochures, and much more) www.epa.gov/nps/toolbox
- Utah's Getting Your Feet Wet with Social Marketing ag.utah.gov/conservation/GettingYourFeetWet1.pdf

Municipal Operations/Good Housekeeping

- EPA's National Menu of BMPs, www.epa.gov/npdes/menuofbmps
- California Stormwater Quality Association Handbook on Municipal Operations, <http://www.cabmphandbooks.com>

General

- EPA's Stormwater Website, www.epa.gov/npdes/stormwater
- EPA's Stormwater Webcast Series, www.epa.gov/npdes/training
- EPA's Compliance Monitoring Strategy (Audits and Inspections) www.epa.gov/compliance/monitoring/programs/cwa/npdes.html
- EPA's NPS Website, <http://www.epa.gov/nps>
- EPA's LID Website, www.epa.gov/owow/owow/nps/lid
- NPDES News (email newsletter), www.epa.gov/npdes/npdesnews
- NPS/Stormwater Info (listserv, ongoing dialog on urban and agriculture stormwater issues) Go to https://lists.epa.gov/read/all_forums/subscribe?name=npinfo and fill in the form
- Center for Watershed Protection, www.cwp.org and their Stormwater Manager's Resource Center, www.stormwatercenter.net
- California Stormwater Quality Association, www.casqa.org



Resource List for Stormwater Management Programs

Revised May 2007

EPA 833-F-04-003

This is a list of helpful resources for stormwater program managers. It is by no means a comprehensive list as there are too many helpful materials produced by too many organizations. This list is meant to highlight EPA's tools and resources to get stormwater programs managers started on developing or improving their programs.

This list is divided into six sections—general stormwater information, public education and outreach, illicit discharge detection and elimination, construction site runoff control, post-construction site runoff control, and pollution prevention/good housekeeping.

General Stormwater Information

- **EPA Stormwater Website** – Contains technical and regulatory information about the NPDES stormwater program. It is organized according to the three types of regulated stormwater discharges—construction activities, industrial activities, municipal separate storm sewer systems. www.epa.gov/npdes/stormwater
- **2003 Construction General Permit** – This 59-page document is EPA's new Construction General Permit (CGP). www.epa.gov/npdes/pubs/cgp2003_entirepermit.pdf
- **Construction General Permit** – Describes EPA's construction general permit and provides links to fact sheets and the new electronic notice of intent web site. www.epa.gov/npdes/stormwater/cgp
- **Construction Industry Compliance Assistance Center** – Developed by the National Center for Manufacturing Sciences, provides explanations of environmental rules for the construction industry. Also provided are links to detailed information, including state regulations and other resources. www.cicacenter.org
- **EnviroFacts Data Warehouse** – EPA's one-stop resource for environmental topics. Includes advanced search capabilities for maps, reports and queries. www.epa.gov/enviro/index_java.html
- **EPA's Electronic Stormwater Notice of Intent (eNOI) Homepage** – Allows construction sites and Industrial facilities to apply for EPA's General Construction Permit (GCP) or Multi-Sector General Permit (MSGP-2000) electronically. www.epa.gov/npdes/stormwater/enoi
- **Fact Sheet on EPA's 2003 CGP** – This 38-page document describes EPA's CGP. www.epa.gov/npdes/pubs/cgp2003_fs.pdf

- **Institutional Aspects of Urban Runoff Management: A Guide for Program Development and Implementation** – This book by The Watershed Management Institute contains a comprehensive review of the institutional frameworks behind successful urban runoff management programs. Includes summaries of 32 successful programs.
http://www.stormwater.ucf.edu/publications/urban_runoff.pdf
- **Menu of Best Management Practices (BMPs) for Phase II** – Contains more than 100 fact sheets detailing BMPs for each minimum control measures.
www.epa.gov/npdes/stormwater/menuofbmps
- **Measurable Goals Guidance** – EPA developed this website to help small MS4 communities select measurable goals to evaluate their program.
<http://www.epa.gov/npdes/stormwater/measurablegoals>
- **Nonpoint Source News Notes** – A periodic report on the condition of water-related environment, the control of nonpoint water pollution and ecological management and restoration of wetlands.
www.epa.gov/newsnotes/
- **NPDES News** – Use this website to sign up for EPA's NPDES News listserver to receive updates on the EPA's NPDES program.
<http://cfpub.epa.gov/npdes/newsregister.cfm>
- **Nonpoint Source Pollution Information (NPSINFO) Listserve** – A forum for open discussion of nonpoint source pollution issues. Participants exchange information on urban runoff, hydrologic modification, technology and more. Sponsored by the EPA's Office of Wetlands, Oceans and Watersheds.
www.epa.gov/OWOW/info/NewsNotes/notifi.htm
- **Stormwater: The Journal for Surface Water Quality Professionals** – Features articles, interviews and news about water quality improvement and protection.
<http://stormh2o.com/sw.html>
- **Stormwater Authority** – A comprehensive online source for relevant information, news, events and education on stormwater.
www.stormwaterauthority.org/
- **Stormwater Case Study: Monroe County, New York** – Monroe County enlists the aid of volunteers to help monitor streams and large water bodies.
http://cfpub.epa.gov/npdes/stormwater/casestudies_specific.cfm?case_id=16
- **Stormwater Control Operation and Maintenance Model Ordinance** – Developed to assist managers in developing their own ordinances.
www.epa.gov/owow/nps/ordinance/stormwater.htm
- **Stormwater Phase II Final Rule Fact Sheet Series** – Developed these fact sheets to explain the Phase II rule, minimum control measures and permitting.
<http://cfpub.epa.gov/npdes/stormwater/swfinal.cfm>

- **Storm Water Management for Construction Activities: Developing Pollution Prevention Plans and Best Management Practices** – Provides detailed guidance on the development of storm water pollution prevention plans (SWPPP) and identification of best management practices (BMPs) for construction activities. It provides technical assistance and support for all construction activities subject to pollution prevention requirements established under NPDES permits for storm water point source discharges. It includes a set of worksheets, a checklist, and a sample SWPPP (EPA 832-R-92-005).
www.epa.gov/npdes/pubs/owm0307.pdf
- **Stormwater Management** – Center for Watershed Protection developed this website to provide managers with links to helpful manuals and other web sites.
www.cwp.org/stormwater_mgt.htm
- **Stormwater Manager's Resource Center** – Contains many resources for stormwater managers, including guidance documents, slide shows, model ordinances, and fact sheets.
www.stormwatercenter.net/
- **Stormwater Practices for Cold Climates** – Developed by the Center for Watershed Protection can be downloaded for free.
www.cwp.org/cold-climates.htm
- **International Stormwater Best Management Practices (BMP) Database** – Developed under a cooperative agreement between EPA and ASCE, provides access to BMP performance data for 200 BMP studies conducted over the past 15 years.
www.bmpdatabase.org/
- **Catching the Rain: a Great Lakes Resource Guide for Natural Stormwater Management** – This report by American Rivers outlines natural stormwater management approaches appropriate for the great lakes region. It demonstrates alternative stormwater management techniques.
www.americanrivers.org/site/DocServer/CatchingTheRain.pdf?docID=163
- **UNH Stormwater Research Center** – The University of New Hampshire's online stormwater database contains factsheets, research materials, articles and links to other stormwater sites.
www.unh.edu/erg/cstev
- **Watershed Academy Web: Online Training in Watershed Management** – This online distance learning program offers self-paced training modules for a basic introduction to the watershed management field.
www.epa.gov/watertrain/

Public Education and Outreach

- **After the Storm Video** – New ½ hour television program about watersheds co-produced by EPA and The Weather Channel premiered on Feb. 4, 2004 (EPA 840-V-04-001).
www.epa.gov/weatherchannel/
- **American Oceans Campaign** – Contains helpful materials for educating the public, such as a video narrated by Ted Danson, links to stormwater resources in California, and a special report developed by AOC.
www.oceana.org/north-america/media-center/

- **City of Los Angeles Stormwater Program** – Includes links to public outreach resources, industry BMPs, teacher workshops and educational programs, and much more.
www.lastormwater.org/WPD/program/pubedpage.htm
- **Communicator's Guide for Federal, State, Regional, and Local Communicators** – The Federal Communicator's Network developed this guide to offer some general guidance to improve the trust between government and the public by helping officials communicate clearly to the public and by making government's message relevant.
<http://govinfo.library.unt.edu/npr/library/papers/bkgrd/communicators.html>
- **Community Culture and the Environment: A Guide to Understanding a Sense of Place, Nov. 2002** – Explores the concepts of community and culture and provides tools for identifying, assessing, and working cooperatively within the social dynamics and local values connected to environmental protection (EPA 842-B-01-003).
www.contextsensitivesolutions.org/content/reading/epa_community/
- **Earthwater Stencils** – Provides ideas for public involvement activities for stormwater programs.
www.earthwater-stencils.com/
- **Enviroscapes** – Allows the development of realistic, three-dimensional models of watersheds, landfills, wetlands and more. An effective demonstration tool for students interested in learning about point sources and non point sources of water pollution.
www.enviroscapes.com
- **Getting In Step: A Guide for Conducting Watershed Outreach Campaigns** – Provides some of the tools you will need to develop and implement an effective watershed outreach plan. If you're a watershed practitioner trained in the sciences, this manual will help you address public perceptions, promote management activities, and inform or motivate stakeholders (EPA 841-B-03-002).
www.epa.gov/nps/outreach.html
- **Getting in Step: Engaging and Involving Stakeholders in Your Watershed** – Provides the tools needed to effectively identify, engage, and involve stakeholders throughout a watershed to restore and maintain healthy environmental conditions.
www.epa.gov/owow/watershed/outreach/documents/stakeholderguide.pdf
- **Kids, Students, Teachers** – Provides information and curricula on educating a variety of age groups on the environment and water pollution.
www.epa.gov/epahome/students.htm
- **Know Your Watershed** – Developed by the Conservation Technology Information Center, has a good list of helpful resources (including guidebooks) for watershed groups.
www2.ctic.purdue.edu/kyw/kyw.html
- **Polluted Runoff (Non Point Source Pollution): Outreach** – Contains information and links to a variety of non point source pollution documents, factsheets, testimonials, videos and more.
www.epa.gov/owow/nps/outreach.html
- **EPA's Public Education and Outreach Menu of BMPs** – Links to 19 facts sheets on different BMPs for educating the public.
www.epa.gov/npdes/stormwater/menuofbmps/publiceducation

- **EPA's Public Involvement and Participation Menu of BMPs** – Links to 10 fact sheets detailing ideas and activities on how to get the public involved.
www.epa.gov/npdes/stormwater/menuofbmps/publicinvolvement
- **Stormwater Month Outreach Materials and Reference Documents** – EPA has developed a set of materials that state or local governments can customize and use in their own stormwater outreach campaigns.
www.epa.gov/npdes/stormwatermonth
- **Think Blue San Diego** – Provides an overview of San Diego's stormwater pollution prevention program Think Blue San Diego. Includes program objectives and organization.
www.sandiego.gov/thinkblue
- **Volunteer Monitoring** – Check out this EPA website to download helpful fact sheets and methods manuals, learn about upcoming events, and link to other helpful resources.
www.epa.gov/owow/monitoring/volunteer/
- **Water Environment Federation for Students** – Check out this web page to download WEF's materials and curricula for educating various age groups. Also provides information in Spanish.
www.wef.org/Home

Illicit Discharge Detection and Elimination

- **Illicit Discharge Detection and Elimination: A Guidance Manual for Program Development and Technical Assessments** – Outlines practical, low-cost and effective illicit discharge detection and identification techniques.
www.cwp.org/idde_verify.htm
- **Illicit Discharge Detection and Elimination Manual** – The New England Interstate Water Pollution Control Commission developed this manual to provide an overview of the IDDE component of the Phase II regulations and practical information on various approaches municipalities can use to carry out the requirements of the regulations.
www.neiwpc.org
- **Illicit Discharge Detection and Elimination (IDDE) Menu of BMPs** – Links to 8 fact sheets outlining various IDDE best management practices.
www.epa.gov/npdes/stormwater/menuofbmps/illicitdischarge
- **Illicit Discharges Model Ordinances** – EPA developed this website to assist managers in developing their own ordinances.
www.epa.gov/owow/nps/ordinance/discharges.htm
- **Investigation of Inappropriate Pollutant Entries into Storm Drainage Systems: A User's Guide** – Contains information to allow the design and conduct of local investigations to identify the types and to estimate the magnitudes of non-stormwater entries into storm drainage systems (EPA-600-R-92-238).
www.epa.gov/npdes/pubs/investigating_inappropriate_pesds.pdf
- **Sanitary Sewer Overflows (SSOs)** – EPA developed this website to provide more information on SSOs, including fact sheets and an SSO toolbox.
www.epa.gov/npdes/sso

Construction Site Runoff Control

- **Best Management Practices for South Florida Urban Stormwater Management Systems** – The South Florida Water Management District has prepared this document to increase public awareness about the management of urban stormwater runoff and how best management practices (BMPs) can be used to improve water quality.
https://my.sfwmd.gov/pls/portal/docs/PAGE/PG_GRP_SFWMD_ENVIROREG/PORTLET_REGUI_DANCE/TAB383509/BMP_MANUAL.PDF
- **EPA's Construction Site Runoff Control Menu of BMPs** – Links to 39 fact sheets outlining various IDDE best management practices.
www.epa.gov/npdes/stormwater/menuofbmps/construction
- **EPA's Erosion and Sediment Control Model Ordinances** – Assists managers in developing their own ordinances.
www.epa.gov/owow/nps/ordinance/erosion.htm
- **International Erosion Control Association** – The International Erosion Control Association is a non-profit, member organization that provides education and resource information for professionals in the erosion and sediment control industry.
www.ieca.org/
- **International Stormwater Best Management Practices Database** – Provides access to BMP performance data for about 200 BMP studies conducted over the past 15 years.
www.bmpdatabase.org
- **Kentucky Erosion Prevention and Sediment Control Field Guide** – Comprehensive guide to Kentucky's BMPs for erosion and sediment control for highway construction projects.
www.tetrattech-ffx.com/wstraining/pdf/esc_guide.pdf
- **Storm Water Management for Construction Activities: Developing Pollution Prevention Plans and Best Management Practices** – Provides detailed guidance on the development of storm water pollution prevention plans (SWPPP) and identification of best management practices (BMPs) for construction activities. It provides technical assistance and support for all construction activities subject to pollution prevention requirements established under NPDES permits for storm water point source discharges. It includes a set of worksheets, a checklist, and a sample SWPPP (EPA 832-R-92-005).
www.epa.gov/npdes/pubs/owm0307.pdf

Post-Construction Site Runoff Control

- **Bioretention Applications: Fact Sheet** – Two case studies (in Largo, Maryland, and Tampa, Florida) demonstrate the potential to use low impact development practices in the design of new parking facilities and as retrofits for existing parking facilities to reduce runoff volume and remove pollutants. Includes monitoring data.
www.epa.gov/owow/nps/lid/lidlit.html
- **Green Roofs for Healthy Cities** – This non-profit industry association's website collects and publishes technical information on green roof products and services.
www.greenroofs.org
- **Low Impact Development Center** – The Low Impact Development Center strives to help communities use proper site design techniques to protect their water resources.
www.lowimpactdevelopment.org/

- **Low Impact Development Practices for Stormwater Management** – Sponsored by the housing industry discusses building products, materials, new technologies, business management and housing systems.
<http://www.toolbase.org/TechInventory/TechDetails.aspx?ContentDetailID=909&BucketID=6&CategoryID=11>
- **Low-Impact Development Page** – Developed by EPA, provides links to EPA documents and other helpful organization's web sites.
www.epa.gov/owow/nps/lid/
- **Low Impact Development Integrated Management Practices Guide** – Prince George's County Maryland developed this manual to push the site design envelope to show how stormwater controls can be integrated into a site in innovative ways. The practices are pure concepts which are presented to provide the user with examples of what could be done to control stormwater.
<http://www.goprincegeorgescounty.com/government/agencyindex/der/esd/manuals.asp>
- **Low Impact Development: Urban Design Tools** – Provides watershed managers with tools and techniques for meeting regulatory and receiving water protection program goals for urban retrofits, redevelopment projects and new development sites.
www.lid-stormwater.net/
- **Natural Approaches to Stormwater Management** – Produced by the Puget Sound Action Team, showcases early examples of the efforts of planners, developers and engineers to transition to low impact development.
www.psat.wa.gov/Publications/LID_studies/LID_approaches.htm
- **Post Construction Controls Model Ordinance** – EPA developed this website to assist managers in developing their own ordinances.
www.epa.gov/owow/nps/ordinance/postcons.htm
- **EPA's Post-Construction Site Runoff Control Menu of BMPs** – Links to 39 fact sheets outlining various structural and non-structural best management practices for post-construction runoff control.
www.epa.gov/npdes/stormwater/menuofbmps/postconstruction
- **Puget Sound Online: Low Impact Development** – Sponsored by the Puget Sound Action Team Partnership, this web page addresses issues and innovations in low impact development.
www.psat.wa.gov/Programs/LID.htm
- **EPA's Smart Growth** – Provides information on various smart growth topics and EPA funding sources, and links to other helpful web sites.
www.epa.gov/livability/
- **Smart Growth Online** – Sponsored by the Smart Growth Network, this site is a forum for discussing smart growth BMPs, innovative policies, tools and ideas.
www.smartgrowth.org/sgn/default.asp?res=800
- **Smart Growth for Clean Water: Helping Communities Address the Water Quality Impacts of Sprawl** – This report from the National Association of Local Government Environmental Professionals identifies five smart growth approaches, and profiles several local partnerships that have reaped the economic and environmental benefits of these approaches.
www.nalgep.org/publications/PublicationsDetail.cfm?LinkAdvID=42157

- **Street Storage for Combined Sewer Surcharge Control** – Highlights two case studies in Illinois that reduce the rate of runoff entering combined sewer systems by using street storage and catch basin modifications. October 2000 (EPA-841-B-00-005C).
http://www.lowimpactdevelopment.org/ftp/Street_Storage_Factsheet.pdf
- **Street Storage System for Control of Combined Sewer Surcharge: Retrofitting Stormwater Storage into Combined Sewer Systems** – Describes a case study-based evaluation of street storage technology, highlighting strategies for temporarily storing stormwater on urban surfaces (EPA-600-R-00-065). Also available through NTIS: NTIS NO: PB2000-107451.
www.epa.gov/ednrmrl/publications/reports/epa600r00065/epa600r00065.pdf
- **Vegetated Roof Cover: Fact Sheet** – Case study in Philadelphia, Pennsylvania on vegetated roofs. The study demonstrates the use of a vegetated roof to reduce runoff, conserve energy and improve community aesthetics. Includes design information and monitoring data (EPA-841-B-00-005D).
www.epa.gov/owow/nps/lid/lidlit.html

Pollution Prevention/Good Housekeeping

- **National Management Measures to Control Nonpoint Source Pollution from Urban Areas** – Contains information on the best available methods to economically reduce urban-generated surface and ground water pollution.
www.epa.gov/owow/nps/urbanmm/index.html
- **EPA's Pollution Prevention and Good Housekeeping Menu of BMPs** – Links to 13 fact sheets outlining various best management practices for pollution prevention and good housekeeping.
www.epa.gov/npdes/stormwater/menuofbmps/goodhousekeeping
- **Techniques for Tracking, Evaluating and Reporting the Implementation of Non Point Source Control Measures** – Helps federal, state, regional and local environmental professionals track the implementation of BMPs used to control urban non point source pollution.
www.epa.gov/owow/nps/urban2.html

Funding Sources

- **An Internet Guide to Financing Stormwater Management** – Designed to help communities find ways to fund stormwater management projects.
<http://stormwaterfinance.urbancenter.iupui.edu/>
- **Catalog of Federal Funding Sources for Watershed Protection** – The Catalog of Federal Funding Sources for Watershed Protection Web site is a searchable database of financial assistance sources (grants, loans, cost-sharing) available to fund a variety of watershed protection projects.
<http://cfpub.epa.gov/fedfund/>
- **State Revolving Fund** – State Revolving Fund programs in each state and Puerto Rico are funded by EPA and operated like banks. Assets are used to make low- or no-interest loans.
<http://www.epa.gov/owm/cwfinance/cwsrf/index.htm>