



Green Infrastructure Partnership Opportunity Program

APPLICATION FORM

Deadline: September 6, 2021 at 11:59 PM CDT

The Metropolitan Water Reclamation District of Greater Chicago (MWRD) is accepting applications for partnership funding opportunities. MWRD seeks to partner with local municipalities and public agencies to install green infrastructure (GI) throughout Cook County. **For more information, including program guidelines, partnership responsibilities, and eligibility requirements, visit <https://mwrdd.org/GI-app>.**

HOW TO SUBMIT THE APPLICATION

Applications and all attachments must be submitted via online application (preferred) or by e-mail.

Online Application: Submit application online using the online application form found at <https://mwrdd.org/GI-app>.

E-mail: It is strongly preferred that applications be submitted using the online application form above, but if necessary, the fillable PDF form (the preferred PDF format) can be submitted to GIApps@mwrdd.org. Limit email size (including attachments) to under 50MB. Submit application in one email only if possible, and include a list of all attachments in that email. Attach files using a filename that is unique to your project, referencing the organization name and/or project title.

Mail: We are no longer accepting applications by mail unless specifically requested. You may contact GIApps@mwrdd.org to request or ask additional questions.

Contact for Questions

Holly Sauter
Principal Civil Engineer
Metropolitan Water Reclamation District of Greater Chicago

SauterH@mwrdd.org

312-286-6023

The following information must be received by MWRD on or before Monday, September 6, 2021 at 11:59 PM CDT. Late or partial applications will not be accepted. A representative authorized by the public partner must execute the signature page of the application in order for it to be accepted. If using the fillable PDF form, the PDF is set up for electronic signature. If you prefer to sign a hard-copy, please print out the signature page separately and scan and email a copy of that page along with the completed electronic application.

Eligibility Requirements

The following are the eligibility requirements for MWRD's Green Infrastructure Partnership Opportunity Program:

- Projects must be within the MWRD's corporate boundaries (follow this link to confirm: http://geohub.mwrdd.org/datasets/20fc3aea83d344a19f3529a5828993af_0).
- Projects must be designed to manage stormwater using green infrastructure.
- Applicants must have (or be able to obtain) perpetual ownership or easement over the project site.
- Applicants will not use funding to satisfy required obligations due to the MWRD's Watershed Management Ordinance (WMO) or any other local, state, or federal regulations due to public development. Please note that some projects may require a WMO permit due to its own project disturbance, a new sewer, etc. Please refer to <https://mwrdd.org/wmo> for additional information on permit requirements.
- The Applicant must be a public entity able to enter into an intergovernmental agreement (IGA) with the MWRD. Eligible public entities include municipalities, townships, county agencies, park districts, school districts, and other local government organizations.
 - ◇ Projects will be required to meet MWRD's Minority Business Enterprise (MBE), Women's Business Enterprise (WBE), and Small Business Enterprise (SBE) requirements, as well as the MWRD's Veterans Business Enterprise (VBE) goals.
 - ◇ Please see website for more information on typical IGA requirements: <https://mwrdd.org/GI-app>
- The Applicant must agree to maintain and operate the completed project long term.
- The Applicant should verify the capability to perform all aspects of the project by each department within their agency or community which will take part in funding, contract administration, maintenance and other requirements of the applicant.

APPLICANT INFORMATION

Organization:

Name: _____

Department: _____

Street Address: _____

City: _____ State: _____ Zip Code: _____

Primary Contact:

First Name: _____ Last Name: _____

Title: _____

Phone: _____ Email: _____

PROJECT INFORMATION

Please note MWRD ranks all GI project applications on many different criteria including but not limited to Design Retention Capacity (DRC), propensity of nearby flooding (including frequency and severity), number of benefitting flood-prone structures as a result of the project, and cost-effectiveness. The MWRD values projects that capture rainfall and runoff from adjacent impermeable areas beyond the footprint of the project. Historically the MWRD has selected between 10 and 20 applicants per year, typically funding up to as much as \$800,000 with the partner. The level of funding commitment by the applicant as well as other funding resources such as grants or state funding are reviewed and considered during the selection process, but do not exclude anyone from consideration if all funding has not been identified at time of application.

Project Title: _____

Project Description:

- 1) Provide a brief description of the proposed project, identify all project locations, identify all major GI components, and describe how the project will address existing drainage/flooding issues.

Project Location:

2) Street Address*: _____

or Nearest Intersection: _____

City: _____ State: _____ Zip Code: _____

* If your project is a green alley, use either of the following example formats:

1. the 1900 block between 57th Court & 57th Avenue
2. between S Homan Avenue and S Trumbull Avenue, bounded by W Columbus Avenue and W 80th Street

If your project spans multiple locations, provide a list of addresses or intersections included with the map.

Existing Conditions:

- 3) Provide a brief description of the existing site conditions, including how the site is currently used.
- 4) Describe the type and impact of flooding that this project is intended to address (e.g., overland or sewer backup, flooding of roadways, buildings, etc.). If possible, please estimate depth and width of flooded area. Please provide documentation (pictures, call data, etc.) as an attachment.
- 5) Is the project located on property that is solely owned by the Applicant? yes no
If no, please explain how the land rights will be secured for the project:

Project Status:

6) Which stage below most closely describes the project's status? Note that the MWRD will review plans ranging from conceptual to fully completed designs and provide feedback to maximize the project's benefits.

CONCEPTUAL — Engineering not yet initiated. Drainage/flooding areas have been identified. Sketches, retention volume estimates, & rough costs developed.

DESIGN — Some preliminary engineering plans, construction details, specifications, cost estimates, & retention volume estimates developed.

SHOVEL READY — Finalized (or close to final) engineered plans, construction details, specifications, cost estimate, & retention volume calculations.

7) Will the design be completed in-house? yes no

If no, please indicate who will be designing the project: _____

8) Has this project received approval from all necessary units of your organization?

For example, those responsible for maintenance and operations. yes no

9a) To the best of your knowledge, does or will this project trigger any local, regional, state or other regulations for stormwater management, including the WMO? yes no unknown at this time

Please briefly explain your answer below.

9b) **I acknowledge that stormwater storage volume needed to meet any agency regulations** (e.g. local, regional, state or other regulations for stormwater management, including the WMO) **will not be reimbursed as part of this partnership.** yes no

10) Does this project require any Right-Of-Way acquisition to the best of your knowledge?

yes no

If yes, have these components been started yet or what is the current status in the process?

yes no

11) What type of sewer service area does this project affect? Combined Separate Unknown

12) If the project being submitted is located within a separate sewer service area, is the local separate sanitary sewer satellite entity (e.g., municipality, township, sanitary district) actively working to get into in compliance with MWRD's Infiltration/Inflow Control Program (IICP)?

yes no

- For more information on the IICP, including the current status of the local separate sanitary sewer satellite entity's IICP status, please see <https://mwrdd.org/wmo>. If more information is needed, please contact mwrddi@mwrdd.org.
- Please note that MWRD may also consider whether applicants have any violations associated with the WMO and/or the current status of the local separate sanitary sewer satellite entity's IICP status during the selection process.

Project Milestone Dates:

- 13) Start Date/ Estimated Start Date for Engineering Design: _____ (mm/dd/yy)
- 14) Estimated Construction Start Date: _____ (mm/dd/yy)
- 15) Estimated Construction Duration: _____ (calendar) days

Note: Please submit a more detailed anticipated design and construction schedule as an attachment if available.

Project Metrics:

- 16) Estimated Total Drainage Area: _____ sq. ft. or _____ acres
Please estimate the amount of land area that will drain into the proposed GI installation.
- 17) Percentage Impervious Surfaces (Existing Site Conditions): _____%
Please estimate the percentage of the total drainage area that is currently an impervious surface (e.g., asphalt, concrete, building areas, etc.).
- 18) Estimated Impervious Surface Reduction: _____ sq. ft.
Please estimate the amount of impervious surfaces that will be converted into permeable surfaces.
- 19) Total Area Covered by All Proposed GI Installations: _____ sq. ft.
On page 11, check all GI components to be installed in the project. For each type of GI, indicate the number of individual installations and the total quantity (square feet) to be installed.
- 20) Estimated Design Retention Capacity (DRC) Provided by all GI Installations: _____ gallons
DRC is the volume of stormwater that can be retained by a GI installation. It can be estimated using MWRD's GI DRC Calculator which is available by downloading the excel calculator file [here](#). Once filled in, please include your volume calculations as an attachment, as required below. Please also mark down on page 11 all GI components to be installed in the project. For each type of GI, indicate the number of individual installations and the total amount of DRC (gallons) to be installed.

21) Number of Structures Benefitted Within Project Area: _____

Estimate the number of structures experiencing flooding issues that will be positively affected by the project. If detailed hydraulic and hydrologic modeling is not available, estimate the number of structures currently affected by basement backups and/or overland flooding located within the same drainage area of the proposed project. For a permeable alley project, structures immediately adjacent to the new permeable surface can be counted. For a bioretention, rain garden project, or large-footprint permeable pavement project, as a first estimate, all structures within a 1/8 mile radius from the installation may be counted. If the project's permeable footprint is non-linear and larger than 48,000 square feet, a 1/4 mile radius may be counted. Please include a map indicating the location of the benefitted structures as an attachment. Note that auxiliary buildings such as residential garages, sheds, or other uninhabited structures should not be counted in this tabulation.

22) Do you have any indication of the depth to seasonally high groundwater on this site?

yes no

If so, please briefly describe below and include any available information as an attachment. If no information of this sort is available, please note that it will be needed in the future if your project is selected.

Public Outreach & Educational Opportunities:

23) Describe any proposed public education and community outreach efforts relating to this project. At a base level, signs and /or plaques with educational information and acknowledgement of the project partners will be required.

For example: fliers, website announcements, signs at installation, library education events, etc.

Project Visibility:

24) Describe the project's visibility. How will the project promote the implementation of GI?

For example: the project site is adjacent to a park or public building, the alley is in a residential area with low visibility, this is a Metra lot with a lot of commuters and pedestrians, etc.

Maintenance:

25) Describe the resources available to provide maintenance for the GI in regards to staffing, equipment, and financial resources. Please provide previous experience in GI maintenance, if any. Please provide an Operations and Maintenance (O&M) plan, if already available, or if not, ideas on tasks that would go into the plan. Please note that O&M will be the responsibility of the partner, and that an O&M Plan will be a requirement of the Intergovernmental Agreement (IGA). Templates for Maintenance of Permeable Pavement and Rain Garden Bioswales can be found at <https://mwrld.org/GI-app>, and the MWRD can assist in assembling template plans for other types of GI.

Please provide the estimated maintenance cost per year for this project. \$_____ /yr

Project Finances:

26) Please provide an estimate of the project’s Capital costs below.

Cost Category	GI Project Costs (\$)*	Non-GI Project Costs, if applicable (\$)	Notes
Engineering and Permitting			This includes construction inspection and management
Construction			If selected and to the extent practicable, MWRDGC biosolids shall be used in any amendments performed to the soils in the proposed project area. These biosolids will be made available free of charge and more information will be provided for those selected project partners.
Land Acquisition			If applicable
Other			
Subtotal Project Cost** (sum of the above costs)			Maintenance costs should be excluded from this table.
Total Project Cost (sum of GI and non-GI Project Costs)			

*Any restoration efforts required for GI construction can be included in GI Project Cost

**Keep GI and non-GI costs separate here

27) Please indicate your planned funding sources below.

Funding Source	Funding Amount (\$)	Status of Funding (Applying/Pledged/Committed)
Applicant Funding*		
MWRD Funding Request**		N/A
Additional Funding (please use the table in question #28 below)		
Total Funding*** (sum of the above amounts)		

*Total funding by the agency. This will include funding from any other source.

**Indicate the amount of funding being sought from MWRD. MWRD may fund up to the requested level of funding. Note that MWRD funding for selected GI projects is in the form of reimbursement of construction related costs only. Engineering, land acquisition, operations, maintenance, and other non-construction related costs are not eligible for MWRD funding.

***Total Project Cost and Total Funding should be equal.

28) Please provide the proposed funding sources for the project.

Organization Name	Funding Amount (\$)	Status of Funding (Applying/Pledged/Committed)

ATTACHMENTS

Please indicate below if you have attached the following documents (not an exhaustive list):

- * Map of project locations, highlighting project areas. Additional project address list.
- * Map highlighting area/ structures that will benefit from the project.
- * Documentation of drainage/flooding problems (map indicating problem locations, photos, 311 calls or similar, stormwater master plan, etc.)
- * Conceptual plans including a cross-section of the proposed GI (a sketch is acceptable if the project is at an early stage)
- * GI storage volume calculations (see question #20 and click [here](#) to download)
- Detailed schedule for design and construction
- Photos
- Engineered plans
- Operations and Maintenance Plan
- Hydraulic & hydrological modeling results
- Soil boring logs or other indication of groundwater levels

* indicates required attachment

SIGNATURE PAGE

Applicant's Authorized Representative

First Name: _____ Last Name: _____

Title: _____

Organization: _____

Project Title: _____

Signature of Authorized Representative*: _____ Date: _____

* **Note:** Digital signatures are preferred, but if not comfortable digitally signing, 2 files may be submitted, a digital copy of the full application (unsigned) and a manually-signed copy of the signature page (scanned and emailed).

By signing above, the Applicant acknowledges they understand the following eligibility requirements.

MWRD Green Infrastructure Partnership Opportunity Eligibility Requirements:

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Green Infrastructure Project BMP Summary (for use in completing items 19 and 20 in the application): List each type of GI installation included in this project. Add any additional BMPs not noted below to this list.

Proposed BMPs	# of Individual Installations	Total Quantity Installed	Units	Total DRC (Gallons)
<input type="checkbox"/> Rain Gardens			Sq. Ft.	
<input type="checkbox"/> Bioswales			Sq. Ft.	
<input type="checkbox"/> Permeable Pavement (Concrete/ Asphalt)			Sq. Ft.	
<input type="checkbox"/> Permeable Pavers			Sq. Ft.	
<input type="checkbox"/> Native Plantings			Sq. Ft.	
<input type="checkbox"/> Green Roofing			Sq. Ft.	
<input type="checkbox"/> Rainwater Harvesting			Gal	
<input type="checkbox"/>				
<input type="checkbox"/>				
<input type="checkbox"/>				
<input type="checkbox"/>				
Total Area of all BMPs in Sq. Ft.				
Total DRC of all BMPs in Gallons				

Note: While DRC is important, MWRD also prioritizes that the new DRC volume is best utilized by collecting runoff from more drainage area than simply what falls directly over the installation. **Therefore, MWRD prefers proposed projects to be located in low-lying areas and/or designed to collect off-site runoff to maximize infiltration of stormwater runoff.**

Metropolitan Water Reclamation District Watershed Management Ordinance - Technical Guidance Manual

DESIGN RETENTION CAPACITY

Click [here](#) to download an excel worksheet which will auto calculate the DRC given a few manual inputs. An example of this [worksheet](#) shown below.

Retention Area #1 (_____)				
Section 1 Upstream Drainage Area				Reference (Sheet #, report, etc)
6	Design soil infiltration rate of surrounding soil	i		in/hr
7	Elevation of bottom of BMP (the infiltration surface) IF there is no underdrain, OR the lowest underdrain invert elevation	ELEV _{BMP}		feet
8	Groundwater elevation	ELEV _{GW}		feet
9	Depth to seasonal groundwater level (Must be 2 feet or greater, or 3.5 feet or greater if draining to combined sewer)	D _{GW}	0.0	feet
Section 3 BMP Specifications				Reference (Sheet #, report, etc)
10	Dimensions of the bioinfiltration facility (length, width, or area)	L		feet
		W		feet
		A _{BMP}		square feet
11	Depth of prepared soil	D ₁		feet
12	Prepared soil porosity (0.25 maximum unless detailed materials report provided)	P ₁		[unitless]
13	Depth of underlying aggregate (optional)	D ₂		feet
14	Aggregate porosity (0.38 maximum unless detailed materials report provided)	P ₂		[unitless]
15	Surface storage volume (provide supporting calculations, max depth 12 inches) (=6" for projects with safety-limited surface storage (CPS))	V _{AIR}		cubic feet
16	Total media void volume = A _{BMP} * [(D ₁ * P ₁) + (D ₂ * P ₂)]	V _{MEDIA}	0	cubic feet
DRC Volume Including Infiltration				Reference (Sheet #, report, etc)
20	Depth of Prepared Soil <u>Below Drain</u> (if drained, if not drained, total depth of prepared soil)	D ₃		feet
21	Soil Void Volume <u>Below Drain</u> = (A _{BMP} *D ₃ *P ₁)	V ₃	0	cubic feet
22	Depth of Prepared Aggregate <u>Below Drain</u> (if drained, if not drained, total depth of prepared aggregate) (must be less than or equal to total depth, D ₁ +D ₂)	D ₄		feet
23	Aggregate Void Volume <u>Below Drain</u> = (A _{BMP} *D ₄ *P ₂)	V ₄	0	cubic feet
24	6-hr infiltrated volume = (i*A _{BMP} *6[hrs]/12[in/ft])	V ₅	0	cubic feet
25	50% of Volume Above Drain = 0.5*(V _{MEDIA} -V ₄ -V ₃)	V ₆	0	cubic feet
26	Total Retained and Infiltration Volume (V ₃ +V ₄ +V ₅ +V ₆ +V _{AIR})	V _{DRC}	0	cubic feet
27	V _{DRC} = Above [in Gallons]	V _{DRC}	0	gallons