



MAINE NATURAL RESOURCE CONSERVATION PROGRAM

Status and Trends Report 2017 – 2022

Report Date: January 2024



Ann Thurlow Preserve, Oxford, ME. Protected with MNRCP funds in 2021. Photo courtesy of Western Foothills Land Trust.



Introduction

Maine's In-Lieu Fee (ILF) Compensation Program was established in 2008 to augment state and federal regulatory programs by providing an additional method for those seeking permits to compensate for impacts to wetlands and other aquatic resources resulting from permitted activities. The ILF program is a voluntary program that provides permit applicants with an alternative to traditional permittee responsible compensation projects and it is jointly managed by the Maine Department of Environmental Protection (MDEP) and the U.S. Army Corps of Engineers (Corps). The program allows applicants to make a payment directly to MDEP as compensation for natural resource impacts. These "in lieu fees" are collected by MDEP and transferred to The Nature Conservancy in Maine (TNC) where they are held in separate accounts depending on the region where the impacts occurred (Appendix A). TNC, in cooperation with MDEP and the Corps, administers the Maine Natural Resource Conservation Program (MNRCP) which allocates the funds collected through the ILF program to wetland restoration, enhancement, and preservation projects that serve as compensation for natural resource impacts.

MNRCP began receiving fees in early 2008 under an agreement with the Corps before the Federal Compensatory Mitigation Regulations ("Mitigation Rule") were finalized. After the Mitigation Rule was finalized in 2008, the state was given three years to come into compliance with the regulations with a Program Instrument. On September 21, 2011, the In Lieu Fee Program Instrument was signed by MDEP and the Corps, updating the governing documents for MNRCP and ensuring compliance with the revised regulations for compensatory mitigation under Section 404 of the Clean Water Act, as well as the compensatory mitigation standards outlined in the Maine Natural Resources Protection Act (NRPA).

As outlined in the State of Maine's In Lieu Fee Program Instrument, a status and trends report is required every five years. The instrument states:

Every five years, the Program Administrator, with assistance from MDEP and the Corps, will produce a status and trends report summarizing the previous five years. The document will examine the goals for each biophysical region and discuss how well the projects assisted with promoting those goals.

An initial status and trends report was completed in March 2018 and covered the period from when the Instrument was signed, September 21, 2011, through September of 2016. This second status and trends report covers the period of September 2016 through the end of 2022.

Status and Trends by Region

In Lieu Fee Permits

As shown in Table 1 below, the highest numbers of ILF payments during the period covered by this report were in the Central Interior and Midcoast and Southern Maine regions, which is consistent with data from the first status and trends report for the program. These two regions are the most heavily populated in the state, and therefore have the most development pressure and corresponding impacts to natural resources. Conversely, only one ILF payment was made in each of the Northwest Maine and Aroostook Hills and Lowlands regions during this time period. The payment in Northwest Maine was the first payment made in this region over the life of the program.

Table 1. In Lieu Fees Received 2017 - 2022

MNRCP Region	Number of ILF Payments	Funds Available for Compensation
Aroostook Hills & Lowlands	1	\$ 467,409.00
Central & Eastern Lowlands	6	\$ 638,314.50
Central & Western Mountains	14*	\$ 1,468,856.89
Central Interior & Midcoast	83	\$ 6,019,256.62
Downeast Maine	18	\$ 494,231.20
Northwest Maine	1	\$ 40,291.00
Southern Maine	72	\$ 9,046,778.91
TOTAL:	195	\$ 18,175,138.12

* The New England Clean Energy Connect (NECEC) project had impacts in both the Central & Western Mountains and in the Central Interior and Midcoast regions. Overall, more impacts occurred in the Central Interior and Midcoast region; therefore, the project is counted in that region and not in Central & Western Mountains.

ILF payments are categorized by development type to track which sectors are contributing the most impacts and funds. As shown in Table 2 below, the Residential/Commercial development impact category had a substantially higher number of total impacts than any other category. However, Table 3 below shows that while this same category still had the highest total amount of fees, the transportation and energy supply/transmission had very similar total fees. This indicates that each residential and commercial development impact tended to be smaller on average as opposed to the transportation and energy impacts which tended to be larger, thereby resulting in larger ILF payments.

Table 2. Number of ILF Payments by Development Type in each MNRCP Region¹ 2017-2022

Development Type	AHL	CEL	CWM	CIM	DM	NM	SM	TOTAL
Transportation	1	1	5	10	8	1	10	36
Energy supply/transmission		3	4*	10			3	20
Residential/Commercial development		2	2	50	3		44	101
Educational/Health facility				6			4	10
Federal Government					1		3	4
Municipal			2	3	1		2	8
Working waterfront				3	3		1	7
Other					2		5	7
Recreation			1	1				2
Region Total:	1	6	14	83	18	1	72	195

¹ AHL = Aroostook Hills & Lowlands, CEL = Central & Eastern Lowlands, CWM = Central & Western Mountains, CIM = Central Interior & Midcoast, DM = Downeast Maine, NM = Northwest Maine, SM = Southern Maine.

* The New England Clean Energy Connect (NECEC) project had impacts in the Central & Western Mountains and in the Central Interior and Midcoast regions. Overall, more impacts occurred in the Central Interior and Midcoast region; therefore, the project is counted in that region and not in Central & Western Mountains.

Table 3. Dollar Amount of ILF Payments by Development Type in each MNRCP Region¹ 2017-2022

Development Type	AHL	CEL	CWM	CIM	DM	NM	SM	TOTAL
Transportation	\$467,409	\$3,536	\$270,305	\$470,367	\$343,739	\$40,291	\$3,528,659	\$5,124,306
Energy supply/transmission		\$458,25	\$860,476	\$3,331,681			\$56,360	\$4,706,770
Residential/Commercial development		\$176,526	\$5,458	\$1,415,542	\$4,804		\$3,783,253	\$5,385,582
Educational/Health facility				\$505,240			\$137,557	\$642,797
Federal Government					\$5,907		\$1,456,903	\$1,462,810
Municipal			\$324,320	\$158,362	\$3,108		\$55,868	\$541,658
Working waterfront				\$44,359	\$16,267		\$1,200	\$61,826
Other					\$120,406		\$26,979	\$147,385
Recreation			\$8,298	\$93,706				\$102,004
Region Total	\$467,409	\$638,315	\$1,468,857	\$6,019,257	\$494,231	\$40,291	\$9,046,779	\$18,175,138

¹ AHL = Aroostook Hills & Lowlands, CEL = Central & Eastern Lowlands, CWM = Central & Western Mountains, CIM = Central Interior & Midcoast, DM = Downeast Maine, NM = Northwest Maine, SM = Southern Maine.

As shown in Figures 1 and 2 below, the number of ILF payments per year and the total fees paid per year have shown a general increase over the life of the program. This is due in large part to the general confidence that MDEP and the Corps have in the ability of MNRCP to provide quality mitigation for natural resource impacts. As described in more detail in the next section, MNRCP has been successful at providing funds to support high quality wetland restoration and conservation. As a result, the agencies have directed more applicants to provide their compensation through the ILF program knowing that the projects funded by MNRCP will provide appropriate mitigation. These data support the anecdotal reports from MDEP and the Corps that around 90 to 95% of all permitted projects that require compensation in Maine are using the ILF program as the means of compensating for natural resource impacts.

Other factors have also contributed to the increase in ILF payments, including MDEP’s 2021 policy change to require compensation for wetland conversion impacts (see Key Program Updates section on Page 13) as well as a surge in development impacts in Maine following the Covid-19 pandemic (with more people choosing to move away from more populated areas of New England to less populated areas in Maine).

Figure 1. Number of ILF Payments Made, 2009 – 2022.

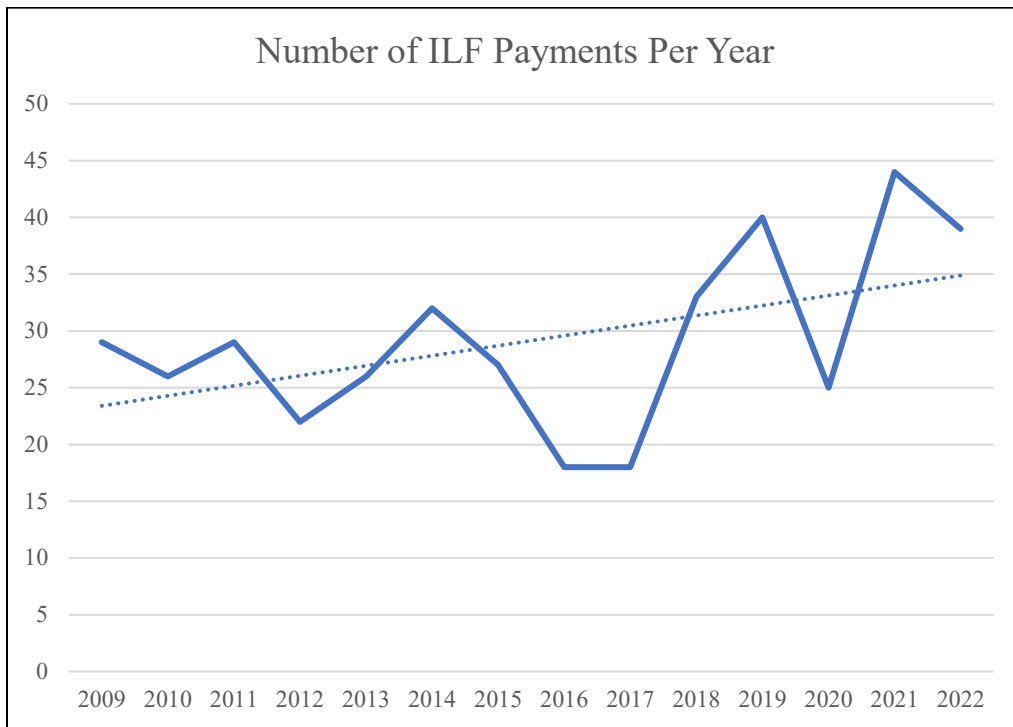


Figure 2. Total Dollar Amount of ILF Payments Per Year, 2009 – 2022.

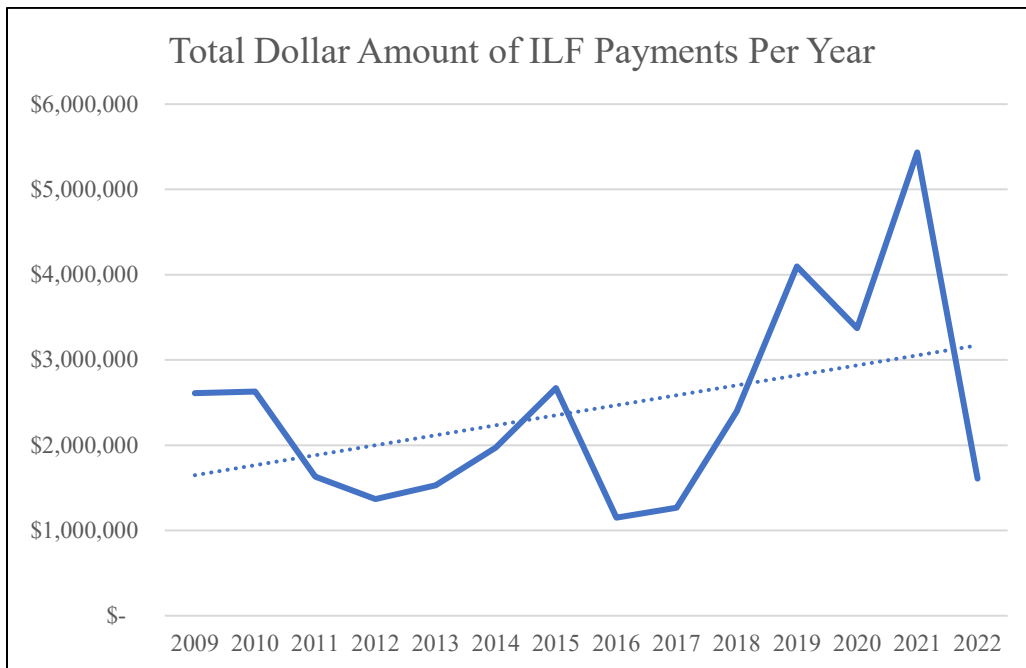


Table 4 below shows the resource types that were impacted by development and paid into the ILF program during the period of this report, along with the percentage of the total that each resource represents. Palustrine (freshwater) forested wetlands represented the habitat with the most impact, followed by vernal pool critical terrestrial habitat and palustrine emergent wetland. Overall, the total amount of impact to freshwater resources far exceeded that of coastal resources, with freshwater impacts accounting for over 95% of the total impacts during this time period. This trend is consistent with how the program has operated since it began in 2008. This result should be expected, as there are far more freshwater wetland resources in Maine than coastal wetlands, development is physically not possible in many of the coastal environments, and federal, state, and local regulations are generally more restrictive on impacts to coastal resources than they are to freshwater resources, thereby resulting in less total impact.

Table 4. Impacts from the ILF Program by habitat type.

Habitat Type		Acres Impacted	% of Total
Freshwater	Palustrine forested (PFO)	45.652	33.17%
	Palustrine scrub-shrub (PSS)	9.905	7.20%
	Palustrine emergent (PEM)	20.014	14.54%
	Palustrine unconsolidated bottom (PUB)	0.016	0.01%
	Vernal pool (VP)	12.338	8.97%
	Vernal pool critical terrestrial habitat (VPCTH)	31.624	22.98%
	Inland Waterfowl & Wading Bird Habitat (IWWH)	11.809	8.58%
Coastal/Tidal	Marine subtidal (M1)	0.898	0.65%
	Marine intertidal (M2)	4.85	3.52%
	Estuarine subtidal (E1)	0.004	0.00%
	Estuarine intertidal (E2)	0.448	0.33%
	Lacustrine limnetic (L1)	0.01	0.01%
	Lacustrine littoral (L2)	0.01	0.01%
	Tidal Waterfowl & Wading Bird Habitat (TWWH)	0.032	0.02%
	Riverine tidal (R1)	0.012	0.01%
TOTAL:		137.622	

MNRCP Compensation Projects

Once the ILF payments are received by DEP, the funds are transferred to TNC where they are held in separate accounts corresponding to the regions in which the impacts occurred. TNC then annually coordinates a grant funding round where funds are awarded for wetland restoration and conservation projects that serve as compensation for natural resource impacts.

Over the time period covered by this report, 2017 to 2022, MNRCP has awarded funds in six of the program's seven regions. Table 5 below shows the breakdown of those awards by number of projects and total funds awarded. The Southern Maine and Central Interior and Midcoast regions had the highest number of awarded projects and the highest amount of funds awarded. This corresponds to the data provided in Tables 1-3 above that show that the most payments have also been made in these regions.

There is more money available in these regions; therefore, more awards can be made and more funds are distributed.

Table 5. Number of Compensation Projects and Total Funds Awarded by Region, 2017 – 2022.

MNRCP Region	Number of Compensation Projects	Funds Awarded
Aroostook Hills & Lowlands	2	\$ 279,768.00
Central & Eastern Lowlands	3	\$ 664,650.00
Central & Western Mountains	7	\$ 1,457,500.00
Central Interior & Midcoast	29	\$ 5,195,060.75
Downeast Maine	9	\$ 731,736.86
Northwest Maine	0	\$ -
Southern Maine	37	\$ 8,834,426.45
TOTAL:	87	\$ 17,163,142.06

As Figures 3 and 4 show below, the number of projects and the total funds awarded has been variable through the years. Both show a slight increase over time, however, there is significantly variability. In recent years, the graphs show a cyclical pattern in number of projects and total funds awarded. This cycle also tracks with the funds received into the program. As more money is received by the program, more attention is given to the program and generally more applications are received. After a large year of awards, for example 2019, the program has seen a lull in the following year’s funding round primarily because the funds in each region have been depleted and many applicants have received recent awards and are working on implementing projects. This has led to fewer proposals and fewer awards the following year, for example in 2020. The typical trend is that funds available in each region then builds back up and the cycle starts again.

Figure 3. Number of MNRCP Awards, 2008-2022.

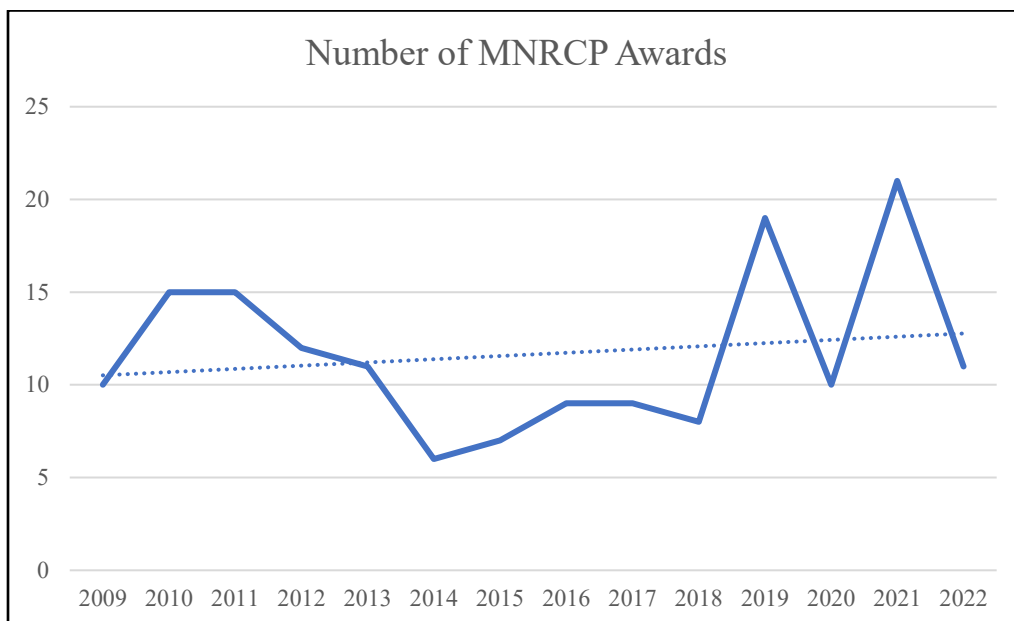
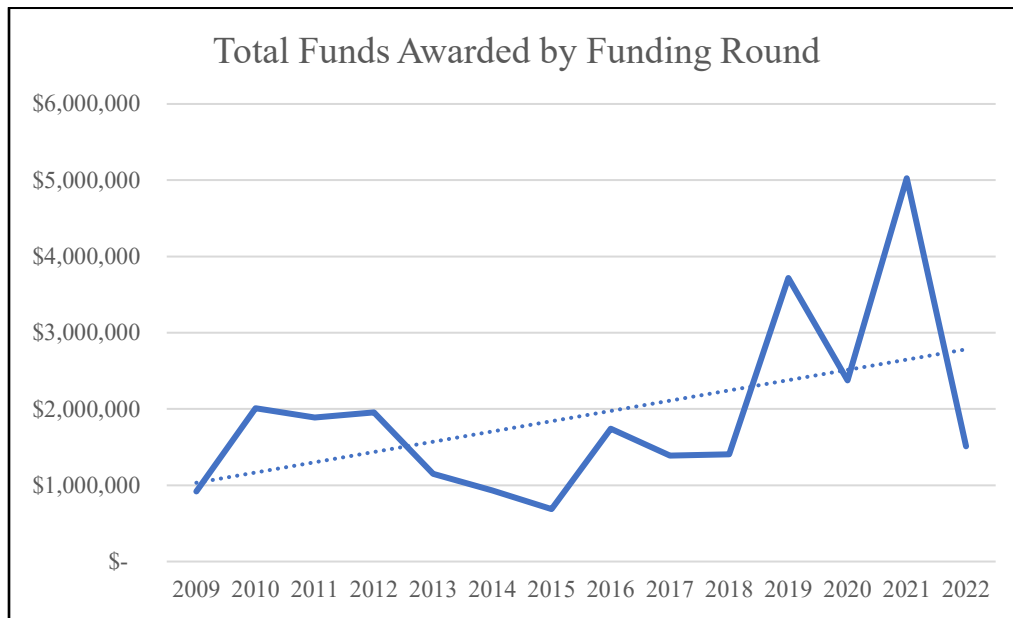


Figure 4. Total Funds Awarded by Funding Round, 2008 – 2022.



As shown in Table 6, the majority of projects awarded funds during the period of this report were preservation projects. These projects protect land and prevent future development, but do not replace lost wetland functions and values, as restoration and enhancement projects do. This trend of primarily preservation projects is consistent with previous years of the program.

Table 6. Types of Projects Receiving Funds by Region, 2017 – 2022.

MNRCP Region	Project Type			Total
	Preservation	Restoration/ Enhancement*	Preservation + Rest/Enhance	
Aroostook Hills & Lowlands	2			2
Central & Eastern Lowlands	1	2		3
Central & Western Mountains	6	1		7
Central Interior & Midcoast	21	6	2	29
Downeast Maine	3	4	2	9
Northwest Maine				0
Southern Maine	27	6	4	37
TOTAL:	60	19	8	87

* Includes stream, fish passage projects (e.g., dam removals, fish ladders)

TNC, DEP, and the Corps are actively working to increase the number of restoration and enhancement projects that are funded by MNRCP as opposed to “preservation only” projects. Restoration and enhancement projects more directly address state and federal mitigation policies regarding “no net loss” of wetland functions and values. While preservation projects help to avoid future impacts, they do not replace wetland acres or wetland functions and values that have been lost to development. MNRCP has

always prioritized restoration and enhancement projects over preservation projects; however, the program is now putting more emphasis and effort into outreach to solicit these types of projects. The goal is for more of the program's credits to come from restoration and enhancement projects in future years.

MNRCP awards are available to non-profit conservation groups, municipalities, Tribes, and state and federal agencies. During the time period of this report, and over the life of the program, land trusts and other non-profit conservation groups have been the primary recipients of MNRCP awards. Municipalities and state agencies have also received multiple awards over the course of the program. State agencies had largely stepped back from submitting proposals during the mid-2010's; however, in 2020, state agencies resumed applications and an award was made to the Maine Department of Inland Fisheries and Wildlife. Awards have been made in subsequent years to the Maine Bureau of Parks and Lands. MNRCP awarded funds to a federal agency for the first time in 2018 and has since made 2 more awards to federal agencies. MNRCP has yet to award funds to one of the Indigenous Tribes in Maine.

The recent applications from state agencies, as well as the hope of future applications from the Tribes, will help to meet the program challenge of finding suitable applicants and projects in certain regions of the state. In some regions, particularly the Aroostook Hills and Lowlands and Central and Eastern Lowlands, MNRCP has not received as many applications even though there is money available to fund projects. This is due, in part, to the fact that there is not as much land trust activity in these regions of the state. It may also be that MNRCP is not as well known in these regions, and therefore more outreach is required. This outreach may need to be directed to different applicant types than what have typically received awards from MNRCP, including Tribes, soil and water conservation districts, municipalities, etc.

Status and Trends for Program Goals

The goals of the MNRCP as stated in the In-Lieu Fee Instrument are listed below, along with an updated assessment of progress towards each goal.

1. Provide an alternative to permittee-responsible and mitigation bank compensatory mitigation that will effectively replace functions and values lost through permitted impacts.

After 15 years of active operation and funding of compensatory mitigation projects, MNRCP is widely viewed as an effective alternative to other mitigation mechanisms available in Maine. Anecdotal estimates from MDEP and the Corps suggest that up to 90 to 95% of permitted projects that require compensation for wetland impacts in Maine currently compensate those impacts through MNRCP. While the program does not require that all permitted impacts be compensated on a strict, one-to-one basis each year, overall program debits and credits are carefully tracked to ensure the timely and effective compensation of functions and values that have been lost. Similarly, the program does not require that all impacts are compensated in-kind (i.e., compensation that replaces the same resource as was impacted); however, the careful tracking of debits and credits is used to evaluate proposed projects so that the program can provide in-kind compensation as much as possible. If there is a concern that too many years have passed without compensation of a particular resource in a given region, the program has actively encouraged proposals that include restoration, enhancement, or preservation of that resource. An additional more extreme step would be to conduct a targeted funding round that solicits proposals only for this particular resource; this step has not been necessary to date. Close collaboration between TNC, DEP, and the Corps allows

MNRCP to anticipate when certain resource types or certain geographies will receive more debits and proactively increase outreach to bring more projects in to provide credits.

Table 7 below shows the total wetland credits sold through permitted impacts and the total wetland credits generated by MNRCP from 2008 through 2022. The majority of the credits generated by MNRCP projects is from preservation projects (approximately 535 total credits), but the total includes significant credits from restoration and enhancement as well.

Table 7. Total Impacts and Compensation through MNRCP, 2008 – 2022

	Total Projects	Wetland Credits
Permitted Impacts	408	297.8
MNRCP Projects	163	789.1

2. Substantially increase the extent and quality of restoration, enhancement, creation, and protection of protected natural resources over that typically achieved by permittee-responsible mitigation for activities that impact wetlands, significant wildlife habitats, and other waters of the State of Maine, which include waters of the U.S.

The MDEP’s Biological Monitoring Program produced a report in October 2013 entitled “Evaluating Alternative Wetland Compensatory Mitigation Assessment Techniques”¹ that indicates potential issues and trends on mitigation sites. This was a study geared toward evaluating assessment methods and it included a small number of sites representing a cross-section of different mitigation projects completed between 1995 and 2007. Nine permittee-responsible mitigation sites were studied. No MNRCP projects were included in the sample; however, the study provides some insights that are applicable to mitigation projects as a whole. Several differences were found between the mitigation study sites and reference sites. One of the strongest differences was the dominance of *Typha sp.* (cattail) on seven of the nine permittee-responsible mitigation study sites. *Typha* was not common on the reference sites and, where present, was not dominant. Mitigation sites also generally had significantly higher nutrient levels and lower water quality classifications. The study also found that the mitigation sites in general had fewer numbers of the types of sensitive aquatic macroinvertebrate taxa and a higher proportion of taxa adapted to a wide range of environmental conditions.

The report indicated that landscape setting and surrounding land use have a significant influence on water quality and aquatic life criteria in the mitigation sites sampled. Habitat complexity, the presence of buffers, and the quality of aquatic and riparian habitat were also found to influence these criteria. This is an important point to consider for MNRCP site selection. Generally speaking, MNRCP has been more likely to fund projects that are located within natural, undeveloped areas with strong upland and riparian buffers.

MDEP continued monitoring mitigation and reference sites after the 2013 report was written and has included MNRCP sites in their annual monitoring starting in 2018 and through 2022. Over the course of

¹ DiFranco, J.L., B. Connors, T. Danielson, L. Tsomides. 2013. Evaluating Alternative Wetland Compensatory Mitigation Assessment Techniques: 104b3 Wetland Program Development Grant Final Report. DEPLW-1258. Maine Department of Environmental Protection, Augusta, ME.

this time period, MDEP has monitored 10 MNRCP sites, including: the Clark Island Wetland Restoration Project in St. George, the Basin Preserve Wetland Restoration Project in Phippsburg, the Taylor Bait Ponds Restoration Project in Orono, the Tiger Hill Forest Project in Casco, the Perley Pond/Northwest River Project in Sebago, the Suckfish Brook Project in Falmouth (both wetlands and stream monitoring), the Shiloh Pond Project in Kingfield, the Hansen Pond Project in Acton, the Morse Pond Project in Georgetown, and the Barrows-Louderback Preserve in Edgecomb.

In early 2023, DEP finalized a follow up report² to the 2013 report which included the results of monitoring at the above-mentioned MNRCP sites, along with other permittee response mitigation sites and reference sites. The 2023 report supported the findings of the 2013 report that landscape setting and land use in the surrounding watershed significantly influence the water quality and attainment of aquatic life, including macroinvertebrate communities. The study also found that the type of mitigation site (restoration/enhancement vs. preservation) also influenced water quality and biological metrics. Restoration sites generally had lower water quality during the early years after construction but were found to improve over time. Preservation sites generally had higher water quality due to their landscape setting. Specific to MNRCP, the report also made the following conclusions:

- Mitigation sites funded through MNRCP were found to outperform permittee responsible mitigation sites by most water quality metrics.
- MNRCP preservation sites appeared to have the best performance attaining water quality goals, mostly likely due to their associations with large tracts of preserved lands and location within areas conserved as long-term natural areas.

Overall, the reports show that MNRCP is achieving its goal of increasing the extent and quality of restoration, enhancement, creation, and protection of protected natural resources over that typically achieved by permittee-responsible mitigation.

3. Reduce the extent of cumulative adverse impacts to aquatic resources that are considered protected natural resources under the Natural Resources Protection Act and the Clean Water Act.

While this is an important aspiration for the State of Maine, it is extremely hard to assess progress toward this goal without regularly conducting a cumulative impact assessment for permitted projects that require compensatory mitigation, permitted projects that do not require compensatory mitigation, and projects that do not require state or federal permits at all (i.e., some activities that impact natural resources may be exempt from state and/or federal permitting). While MNRCP data can be used to assess impacts for projects that utilize the ILF program, permitted projects that perform permittee responsible mitigation are not as closely tracked (and are not the responsibility of the ILF program). The Corps conducted an analysis in 2022 for projects needing federal permits impacting less than 15,000 square feet of freshwater wetlands (the Corps and MDEP's threshold for requiring compensation is 15,000 square feet of impact for most wetland types) and determined that as much as 15 acres of freshwater wetlands are lost each year from these "smaller" impact projects that do not require compensation. A similar analysis has not been

² Connors, B., J.L. DiFranco, D. Sutor. Evaluating Alternative Wetland Compensatory Mitigation Assessment Techniques. Maine Department of Environmental Protection. March 2023.

conducted by MDEP. Further, development in uplands near aquatic resources, but not directly impacting them, can often proceed with no permitting at all (or just local permitting). It is well documented that development in uplands proximate to aquatic resources can adversely impact the functioning of those resources even if there are no direct impacts to the aquatic resources themselves. These types of impacts would also need to be factored into any such analysis of the cumulative adverse impacts to aquatic resources. No such statewide assessment has been completed, or is contemplated. Should such an assessment be conducted in the future, data collected from MNRCP-funded projects will provide important information and context.

4. Provide MDEP and Corps permit applicants greater flexibility in compensating for adverse impacts to protected natural resources.

In-lieu fee mitigation through MNRCP gives permit applicants, MDEP, and the Corps another effective option to compensate for resource impacts, and one that has been used with increasing frequency. As noted above, approximately 90 to 95% of permitted projects with resource impacts in Maine currently compensate those impacts through the ILF program. In fact, the current Corps New England District Compensatory Mitigation Standard Operating Procedures (2020) specifically recommends use of mitigation banks and ILF programs, stating “When a mitigation bank or an ILF program is available, compensatory mitigation conducted using these options is considered preferable to permittee-responsible alternatives...” This directive is due in part to the success of MNRCP, and other New England ILF programs, through the years. MNRCP has been used by permit applicants ranging from private landowners and institutions to utility and energy companies and transportation agencies. Table 8 below shows the sources of the \$33,738,425.57 of in-lieu fees paid into MNRCP from the program’s beginning through 2022.

Table 8. Sources of In-lieu Fee Payments in Maine from 2008 through 2022

Impact Category	Total Fees	Percent of Total Fees	Number of Permits	Percent of Total Permits
Transportation	\$10,302,047.37	30.54%	85	20.83%
Energy supply/transmission	\$8,713,926.03	25.83%	70	17.16%
Residential/Commercial development	\$8,417,366.19	24.95%	163	39.95%
Educational/Health facility	\$2,794,248.65	8.28%	28	6.86%
Federal Government ¹	\$1,643,489.23	4.87%	5	1.23%
Municipal	\$733,323.61	2.17%	18	4.41%
Working waterfront ²	\$566,114.61	1.68%	20	4.90%
Other	\$284,971.18	0.84%	10	2.45%
Recreation	\$282,938.70	0.84%	9	2.21%
TOTAL:	\$33,738,425.57	100.00%	408	100.00%

¹Federal Government includes projects conducted by federal agencies, primarily on federal property. Examples include fill impacts by the U.S Marine Corps and U.S. Navy and dredging impacts by the U.S. Army Corps of Engineers.

²Working waterfront includes piers, docks, boat ramps, marina expansions, retaining walls, shoreline stabilization, and other activities primarily associated with commercial development in waterfront areas.

As shown above, transportation projects have accounted for the highest percentage of fees paid into the program, while residential/commercial development has accounted for the largest percentage of total number of permits. This indicates that while transportation has fewer numbers of projects, they tend to be larger, resulting in more total impact, and therefore the total fees are higher. The same is true for energy supply/transmission projects, which have an even lower number of permits than transportation, but a higher percentage of total fees. Conversely, residential and commercial development projects tend to have smaller impacts, so while there are more permits issued for these projects, each permit is generally associated with a smaller impact and consequently less fees.

Overall, MNRCP is providing applicants with greater flexibility in compensating for unavoidable project impacts. Private landowners often don't have suitable locations for on-site mitigation or the expertise to do their own mitigation and would have to hire consultants and contractors to carry out projects. While large entities such as energy companies or transportation departments still regularly complete permittee-responsible mitigation for some of their projects, the in-lieu fee compensation offered through MNRCP often provides a more efficient and effective option where suitable on-site or other permittee-responsible mitigation projects are difficult to find or complete. Additionally, most permit applicants recognize that carrying out their own mitigation project will be time consuming, especially if they perform a restoration project that will require 5-10 years of post-construction monitoring. Applicants have generally found it easier to pay the in-lieu fees and transfer the mitigation responsibility.

5. Achieve ecological success on a biophysical region basis by directing ILF funds to protected natural resource types and functions that are appropriate to the geographic service area, and by integrating ILF projects with other conservation activities whenever possible.

In Maine, a series of 140 important Focus Areas of Statewide Ecological Significance, known as "Beginning with Habitat (BwH) Focus Areas," have been identified across the state. Each MNRCP Region contains multiple Focus Areas. Proposed projects located within or adjacent to one of these Focus Areas generally receive higher scores for the Landscape Context criterion during review. Proposed projects are also evaluated based on whether they occur within or adjacent to Federal or State conservation lands, regional conservation lands, or municipal and private nonprofit conservation organization lands. Proposed projects near these areas generally score higher in Landscape Context. Proximity to habitat for rare, threatened, and endangered species, and proximity to mapped Significant Wildlife Habitat are also considered during project review. The majority of MNRCP projects contain priority habitats or habitat for priority species.

Table 9 shows the percentage of the 163 projects with MNRCP awards through the 2022 round that occur in priority conservation areas in Maine. Note that it is common for these Priority Areas to overlap. For example, a project may fall within a Beginning with Habitat Focus Area and be adjacent to state, federal, and/or private non-profit conservation lands. While these numbers may fluctuate year to year based on the projects that are awarded funding, they have remained relatively consistent through the years as the program puts a strong emphasis on prioritizing projects that are located within these priority conservation areas.

Table 9. MNRCP Projects within Major Priority Areas

Priority Area	% of Projects
Statewide Habitat Focus Area	47%
Within or Adjacent to Federal or State Conserved Lands	69%
Within or Adjacent to Regional, Local or Private Non-Profit Conservation Lands	74%
Containing Significant Wildlife Habitat or Habitat for Rare, Threatened, and Endangered Species	63%

A set of specific conservation objectives was developed for each MNRCP Region in the Compensation Planning Framework of the In-Lieu Fee Instrument (see Appendix H for MNRCP’s regional conservation objectives). While many of the regional objectives are closely linked to the focus areas, priority conservation areas, and habitats discussed above, several regions include conservation objectives that are specific to that region, including: restoration of marginal and non-productive farmland, fish passage in the Penobscot River or Kennebec River watershed, preservation of vernal pools and headwater streams, and restoration of coastal resources. As part of the 10-year update to the MNRCP Program Instrument, these region-specific conservation objectives are being updated and will be in use for the 2023 funding round as well as future rounds.

Key Program Updates 2017 - 2022

Contingency Funding

In 2018, MNRCP began withholding contingency funds at the program level in order to provide financial assurances that projects would be able to continue to completion in the event of unforeseen circumstances. For two years, a percentage of the total project cost for every project (the percentage varied depending on the project type – preservation, restoration, or a combination of the two) was withheld by MNRCP. This was meant to be a benefit to the applicants so that they knew that the program could potentially provide additional funds if unexpected conditions arose, and a benefit to the program overall to ensure the successful completion of projects and generation of credits. However, in 2019, the Review Committee encountered significant difficulties with making project awards due to the percentage of contingency funds being withheld. Projects were not able to be fully funded because too much money was being withheld for contingency. In two regions, applicants agreed to forego the contingency in order to make more money available to fund projects. During the two years that contingency funds were withheld, no applicant approached MNRCP to use the contingency funds.

Based on the issues that arose during the 2019 proposal review, and the fact that no applicants sought contingency funds, the MNRCP Review and Approval Committees made the decision in 2020 to stop withholding contingency funds for all projects. The topic of contingency then arose again during review of project proposals in 2020. Two projects, Outlet Stream-Morneau and the Willow Brook Culvert

Replacement, included a line item for contingency in their respective budget and requested MNRCP funds for this line item. Ultimately, the Review and Approval Committees agreed to fully fund both projects, including providing funding for contingency. The committees agreed that restoration projects should be encouraged to include some contingency funding in their budgets; however, it was agreed that these funds would not be automatically granted to the applicants after the award. Any applicant seeking those funds must demonstrate a need for them and provide an explanation for why the project went over the original budget. Approval of disbursement of those funds will be subject to approval by DEP and the Corps. As of the time of this report, MNRCP continues to approach contingency in a similar fashion.

Rivers, Streams, and Brooks

In March 2020, the 129th Maine Legislature passed LD 1777, An Act to Add Rivers, Streams and Brooks to the Department of Environmental Protection's Compensation Fee Program. This act established that DEP can now accept in lieu fee payments for impacts to rivers, streams, and brooks, as defined under the Natural Resources Protection Act. MDEP is currently in the process of establishing the fees that will be charged for stream impacts; therefore, as of the time of this report, DEP has not yet received any payments specifically for stream impacts because of this program addition. Once fees are received specifically for stream impacts, MNRCP will be seeking compensation projects that will provide compensation for those impacts. While MNRCP has traditionally been focused on wetlands and Significant Wildlife Habitat, the program may soon be specifically looking for stream restoration and conservation projects to provide compensation for any direct stream impacts that utilize the ILF program.

Subtidal and Marine Impacts

In 2020, several projects paid into the ILF program for marine and subtidal impacts, including one large project at the Portsmouth Naval Shipyard that included impacts to unvegetated subtidal wetland and one large eelgrass impact in Biddeford associated with a dredging project. In 2021, MNRCP funded two eelgrass restoration projects, both of which were projects that would replace traditional block and chain moorings with conservation moorings with a goal of restoring eelgrass populations around the moorings. These are the first subtidal or marine restoration or enhancement projects that the program has funded to date. The program continues to make efforts to find projects to mitigate in-kind for these subtidal wetland impacts; however, it has been difficult to find projects that provide suitable compensation for these impacts. Recognizing that additional impacts to these resources are likely, TNC, DEP, and the Corps will need to continue working with partners and increase outreach efforts to find suitable projects.

Compensation for Conversion Impacts

In recent years, MDEP has seen a rapid increase in solar development in Maine as a result of new laws that encourage and support the development of renewable energy and the priorities set forth in the Maine Climate Action Plan. Since 2020, more than 250 solar development projects have been approved. With the increase in solar development, MDEP has seen a significant increase in wetland conversion impacts, whereby a wetland is converted from one wetland type to another (typically forested wetland converted to emergent or scrub-shrub wetland). MDEP has recognized that the conversion of one wetland type to another results in a change in wetland functions and values, with some functions being diminished or eliminated. As a result, in September 2021, MDEP began requiring compensation for the conversion of greater than 15,000 square feet of freshwater wetlands. MDEP expects that the amount of compensation required will be half (50%) of what would be required for direct impacts to freshwater wetlands, primarily

because conversion does not eliminate the wetland but may reduce the function and value of the wetlands by about half. MDEP expects that this will lead to an increase in new ILF payments and therefore could lead to significantly more money available to fund projects through MNRCP. While MNRCP typically does not have trouble finding projects with forested wetlands, TNC, DEP, and the Corps will continue to expand outreach efforts and seek projects that can serve as compensation for these impacts.

LUPC and MNRCP

In July 2021, a Memorandum of Understanding (MOU) was signed between MDEP and the Land Use Planning Commission (LUPC) that allows applicants seeking permits in the unorganized territories to use the MDEP's ILF program for natural resource compensation. Depending on the details of the project, staff at LUPC will work with either MDEP or the Corps (or both) to calculate the appropriate in lieu fee and the applicant will make the payment directly to MDEP. Similar to permitting in the organized territories, payment of the fee will be required prior to starting construction. MDEP and LUPC already had an MOU in place to cover projects that triggered the Site Location of Development Act (Site Law) in the unorganized territories. That MOU transferred permitting authority to MDEP for these larger projects that are subject to review under Site Law. MDEP and LUPC have also previously agreed that any project that spans both the organized and unorganized territories (e.g., a transmission line project) would be reviewed by DEP. Therefore, while the new MOU could lead to more payments made to the ILF Program, it is expected that these payments will be for smaller developments with smaller impacts and smaller fees and will not result in a significant amount of new funds entering the program. As of the time of this report, no payments have been received by the program for impacts solely in LUPC jurisdiction under the new MOU.

Past Preservation Site Visits

In 2022, TNC began a process to evaluate MNRCP preservation sites that were awarded funds and protected in the early years of the program. The goal of this effort was to perform a basic assessment of each project site and determine if it was still being managed according to the terms of the MNRCP Project Agreement as well as any management plans for the property. TNC started generally with the oldest projects with a plan to work toward the newer ones over time, recognizing that it would take multiple years to visit all the sites. The process began with a basic review of any relevant documents on file for the project, including the Project Agreement, restoration work plans, long-term management plans, easements, etc. TNC staff then reached out to each landowner to acquire any updated management plans and to generally discuss each site. A site visit was then performed to check conditions on the ground.

Overall, results of the project reviews were very positive. TNC found that regular site monitoring was occurring at all sites, aquatic resources were in great shape, and the sites were being appropriately stewarded by the awardees. TNC was also able to acquire updated versions of management plans for sites. In one instance, TNC staff noted that a road/culvert was being upgraded on one of the sites. The site visit provided an opportunity to stress the importance of connecting with MNRCP in advance of such projects and the need to coordinate with DEP, the Corps, and local officials to get permits for such activities. The awardee is now in the process of obtaining the necessary permits for the work.

Some additional lessons learned included:

- Site visits helped answer general awardee questions about MNRCP rules and requirements.

- Staff turnover at awardee organizations occurs regularly, so sometimes newer stewardship staff may not be very familiar with MNRCP; these visits have facilitated good conversations to make people aware of program requirements.
- It is beneficial to connect with land management staff on the ground, in person, to build relationships.

Upland Credit Cap

In August 2022, the Corps issued a public notice that modified their Compensatory Mitigation Standard Operating Procedures to limit the amount of wetland mitigation credit that can be generated from preservation of upland buffer on a site. The Corps noted the importance and need for upland buffers; however, the modification is meant to ensure that upland buffers do not generate more mitigation credit than wetland resources. The modification states “Upland buffers shall generate mitigation credit, however the wetland mitigation credit generated by the buffers **cannot** exceed the mitigation credit generated by the actual wetland or aquatic resource itself.” Essentially this serves as a cap on the amount of credits that can be generated from preservation of upland on a project site. Because the focus of the Corps’ mitigation program is replacement of aquatic functions that are lost as a result of Corps’ permits, the Corps determined that the credits generated from upland should be commensurate with the amount of aquatic resource being restored, enhanced, or preserved. In general, MNRCP has always prioritized projects with a more equal mix of wetland and upland on a project site, so while this change may reduce the number of credits that some preservation projects generate, it should not have a significant impact on the ability of the program to provide wetland credits to offset impacts from development.

Land for Maine’s Future and MNRCP

Throughout 2022, MDEP, TNC, the Maine Department of Agriculture, Conservation and Forestry (DACF), and the Land for Maine’s Future Board (LMFB) worked to develop a Memorandum of Understanding (MOU) that established the terms by which funding from both the Land for Maine’s Future (LMF) program and MNRCP could be utilized on the same project. Prior to the MOU, LMF and MNRCP’s Project Agreement provisions were arranged such that the two Agreements would be in conflict on several provisions were they ever to be used for the same property. Both programs have specific, and different, requirements for priority of title, recordation of Project Agreements (or Notice of Project Agreements), and enforcement mechanisms in the event of transfer of the project lands as well as the default or dissolution of the award recipient. However, it was clear that both programs could benefit from the inclusion of the other’s funding for a project that met the goals of both programs. Therefore, the MOU was drafted to identify specific changes to each program’s Project Agreement that would be utilized if both programs were used to fund the same project. The revised provisions clarify the previous areas of conflict between the two agreements and allow for the inclusion of each other’s funding. The MOU was signed by MDEP, TNC, DACF, and the LMFB in March 2023. As of the time of this report, one project is expected to utilize both programs to acquire a property in Kittery and perform subsequent wetland restoration work.

Conclusions

Overall, Maine's ILF Program continues to operate as a successful third-party compensatory mitigation program, providing applicants and regulatory agencies with flexibility during the permitting process and confidence that collected fees will be used to fund high quality wetland mitigation projects. MNRCP continues to evolve to keep pace with changing regulations and policies while still consistently awarding funds during annual funding rounds and assisting with the implementation of a wide variety of projects. In future years, MNRCP expects to focus more attention on bringing wetland restoration projects through the program. Both MDEP and the Corps have expressed a strong interest in increasing the number and size of wetland restoration projects that the program funds to better address state and federal "no net loss" mitigation policies. This will require increased outreach from the full MNRCP team, as well as assistance to potential applicants in identifying appropriate wetland restoration opportunities.

Appendix A

Maine Natural Resource Conservation Program Regions

