

Mitigation Banking in Georgia

Matt Peevy

Founded **Mitigation Resource Group, LLC** in 2007.

- First consolidated holding company of bank credits in GA
- Primary investors established first stream bank in GA in 2001
- Serves as bank sponsor for 14 mitigation projects in GA
- Last bank was approved in 2015; Implemented in 2016
- Co-sponsoring mitigation proposal for Tired Creek impacts

Founded **Mitigation Management, LLC** in 2010.

- Provides credit brokerage and ecological consulting services
- Exclusive sales agent for 25 banks in GA
- Principals have had direct involvement in over 35 mitigation projects combining for more than:
 - 120 miles of stream mitigation
 - 8,500 acres of critical habitat protection



GERA

GERA is a collaboration of mitigation bankers, environmental consultants, engineers, contractors, conservation non-profits, and other professionals that are active in and committed to an ecosystem restoration marketplace in Georgia.

www.garestoration.org



What Is Mitigation Banking?

The restoration, enhancement, or preservation of a wetland, stream, or other habitat area undertaken expressly for the purpose of compensating for unavoidable resource losses in advance of development actions.



Before



After

4

Types of Permits

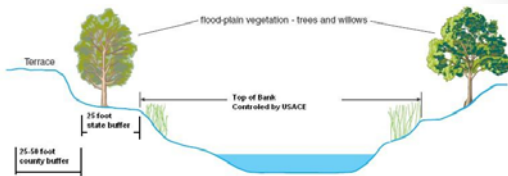
Federal:

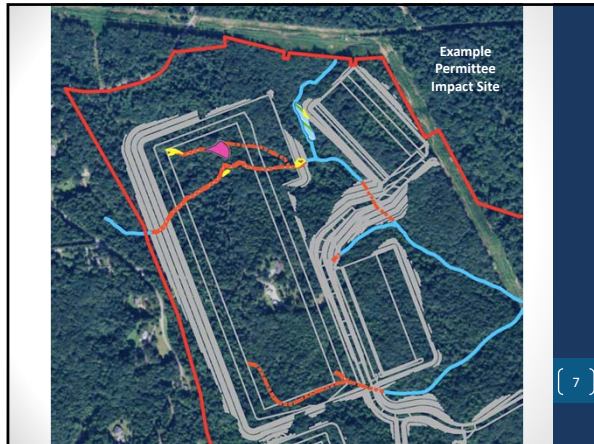
1. Nationwide – for impacts less than 300 feet of stream or .5 acres of wetlands. Typically take 45-60 days to approve.
2. Individual - for impacts greater than 300 feet of stream or .5 acres of wetlands. Typically take 6 months to a year.
3. Both permit types must prove avoidance, minimization, and mitigation (in that order).

State:

1. State Stream Buffer Variance
2. 401 Water Quality Certification (included in Nationwide permits)

Regulatory Jurisdictions





Who needs to purchase credits?

- Residential Developers
- Georgia Department of Transportation
- Commercial and Industrial Developers
- Pipeline Companies
- Power Line Companies
- Rail Road
- Counties and Cities
- Reservoirs

Types of Mitigation Projects

1. **Mitigation Banks:** Credits are released to the bank sponsor based on activity and performance milestones. Credits are then sold speculatively to numerous permittees over time.
2. **In-Lieu Fee (ILF):** If bank credits are not available, permittees may be able to purchase credits from an ILF program. Once the ILF program has sufficient funds in a service area, it will issue a request-for-proposals for mitigation site development in that area. The funds are then released to the selected mitigation provider as its project meets activity and performance milestones and credits are released to the ILF program. Similar to a mitigation bank, except that credit revenues to the selected project sponsor are not speculative.
3. **Permittee-Responsible Mitigation (PRM):** If bank credits and ILF credits are not available, then permittees may be approved to implement their own mitigation project. However, often times permittees will still contract with mitigation providers to deliver the mitigation project for them. From a mitigation provider perspective, these projects are similar to ILF projects except that the client is the permittee rather than the ILF program, and there are no credit "releases" since the credits are not being transferred to third parties.

Mitigation Banking

How Many Banks?

There are 145 public & private mitigation banks in Georgia

45,500+ acres of land protected in perpetuity

265+ miles of stream restored and preserved

21,300+ acres of wetland and upland buffer restored and preserved

Source: www.garestoration.org

Who Are Bankers?

Public Bankers:

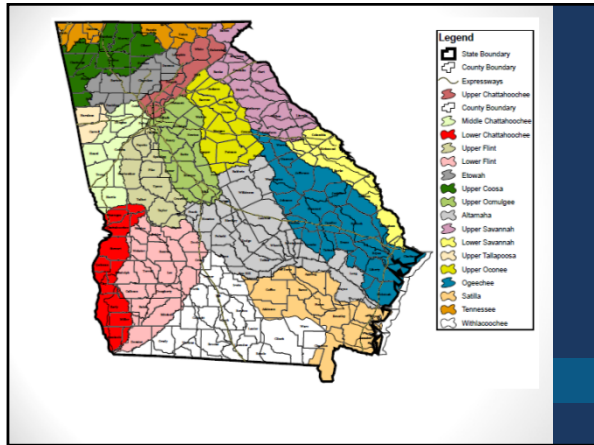
Georgia DOT
Gwinnett County
Chatham County
City of Fairburn

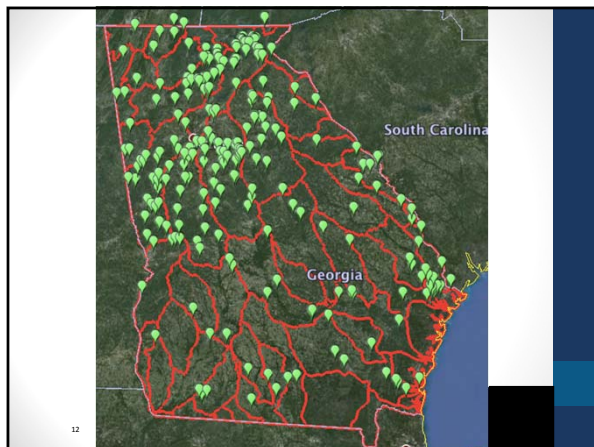
Private Bankers:

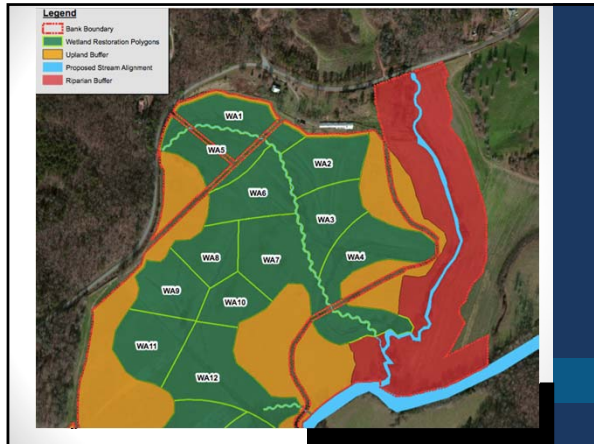
Mitigation Resource Group
Timber Companies
Georgia Power
Monastery of the Holy Spirit
Elachee Nature Science Center
Piedmont College
Private Landowners

*Partial Listing

10







Permitting Mitigation Banks

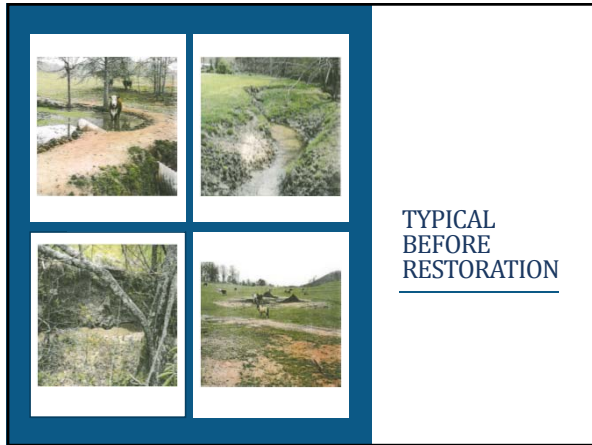
- Permitting Process:
 - IRT meeting
 - Site Visit
 - Submit Draft Banking Instrument (400-600 page document)
 - Public Notice Period, Respond to Comments
 - Submit Final Banking Instrument
 - Record Restrictive Covenants

Release Schedule Overview

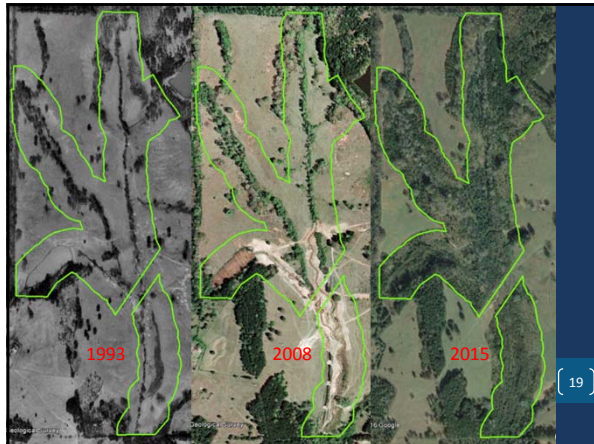
Milestone	Credits Released (%)
Approval (3 - 5 Years)	10%
Implementation (12-24 Months)	10%
Monitoring (7-10 Years)	80%
Total:	100%

Monitoring and Maintenance

- Long Term Monitoring and Maintenance (7 years):
 - Geomorphic Measurements
 - Biological testing for fish and macro invertebrates
 - Water Quality
 - Tree Growth (301/acre with 50% survival rate)
 - Beaver, Hog, Invasive Species Control
- In order to receive future credit releases, we must demonstrate a quantifiable improvement ("ecological lift") in our tested scores over baseline conditions.







"Back of the Napkin" Financial Analysis

CASH IN	
Stream Credit Sales	\$ 2,450,000
Wetland Credit Sales	\$ 2,520,000
Land Disposition	\$ 250,000
TOTAL CASH IN	\$ 5,220,000
CASH OUT	
Land	\$ (1,000,000)
Survey & Engineering	\$ (120,000)
Phase I Surveys	\$ (10,000)
Appraisals	\$ (10,000)
Environmental Consulting	\$ (100,000)
Legal	\$ (25,000)
Construction of Bank	\$ (500,000)
Sales Commissions (6%)	\$ (298,200)
Project Mgmt Fees	\$ (35,000)
Monitoring Costs	\$ (175,000)
Maintenance	\$ (60,000)
Long Term Stewardship	\$ (100,000)
TOTAL CASH OUT	\$ (2,433,200)
NET CASH FLOW	\$ 2,786,800

19



GSWCC Erosion Control Day

Years 1 - 8

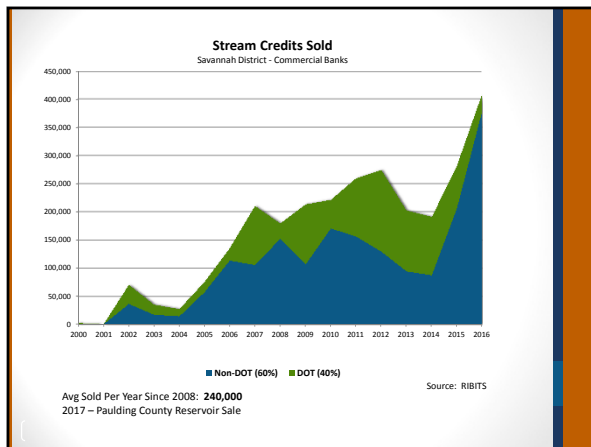
Discounted Cash Flow Model

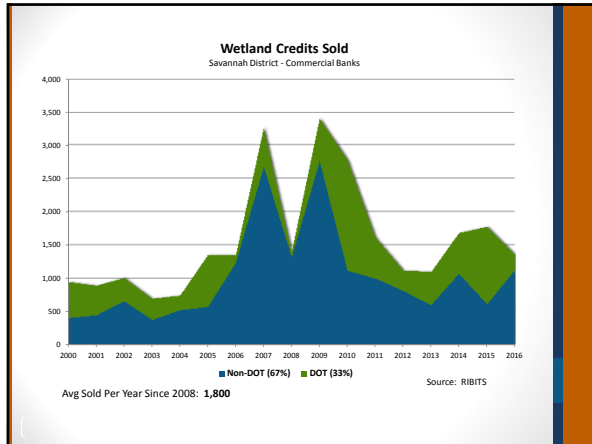
Year (total) Year (calendar)	1 2014	2 2015	3 2016	4 2017	5 2018	6 2019	7 2020	8 2021
CASH IN								
Stream Credit Sales	\$ -	\$ 175,000	\$ 175,000	\$ 175,000	\$ 175,000	\$ 175,000	\$ 175,000	\$ 175,000
Wetland Credit Sales	\$ -	\$ 180,000	\$ 180,000	\$ 180,000	\$ 180,000	\$ 180,000	\$ 180,000	\$ 180,000
Land Disposition	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 250,000	\$ -	\$ -
TOTAL CASH IN	\$ -	\$ 355,000	\$ 355,000	\$ 355,000	\$ 355,000	\$ 605,000	\$ 355,000	\$ 355,000
CASH OUT								
Land	\$ (1,000,000)	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Survey & Engineering	\$ (60,000)	\$ (60,000)	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Phase I Surveys	\$ (10,000)	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Appraisals	\$ (10,000)	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Environmental Consulting	\$ (50,000)	\$ (50,000)	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Legal	\$ (25,000)	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Construction of Bank	\$ -	\$ (500,000)	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Sales Commissions (6%)	\$ -	\$ (21,300)	\$ (21,300)	\$ (21,300)	\$ (21,300)	\$ (21,300)	\$ (21,300)	\$ (21,300)
Project Mgmt Fees	\$ (5,000)	\$ (5,000)	\$ (5,000)	\$ (5,000)	\$ (5,000)	\$ (5,000)	\$ (5,000)	\$ (5,000)
Monitoring Costs	\$ -	\$ -	\$ (25,000)	\$ (25,000)	\$ (25,000)	\$ (25,000)	\$ (25,000)	\$ (25,000)
Maintenance	\$ -	\$ -	\$ (20,000)	\$ -	\$ -	\$ (20,000)	\$ -	\$ -
Long Term Stewardship	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ (100,000)
TOTAL CASH OUT	\$ (1,160,000)	\$ (636,300)	\$ (71,300)	\$ (51,300)	\$ (51,300)	\$ (71,300)	\$ (51,300)	\$ (146,300)
CUMULATIVE NET CASH FLOW	\$ (1,160,000)	\$ (1,441,300)	\$ (1,157,000)	\$ (853,000)	\$ (550,200)	\$ (16,500)	\$ 287,200	\$ 495,900
CUMULATIVE IRR	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	-33.30%

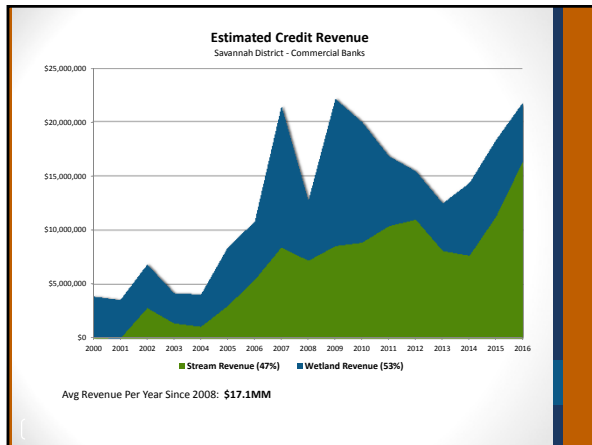
Years 9 - 15

Discounted Cash Flow Model

Year (total) Year (calendar)	9 2022	10 2023	11 2024	12 2025	13 2026	14 2027	15 2028
CASH IN							
Stream Credit Sales	\$ 175,000	\$ 175,000	\$ 175,000	\$ 175,000	\$ 175,000	\$ 175,000	\$ 175,000
Wetland Credit Sales	\$ 180,000	\$ 180,000	\$ 180,000	\$ 180,000	\$ 180,000	\$ 180,000	\$ 180,000
Land Disposition	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
TOTAL CASH IN	\$ 355,000	\$ 355,000	\$ 355,000	\$ 355,000	\$ 355,000	\$ 355,000	\$ 355,000
CASH OUT							
Land	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Survey & Engineering	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Phase I Surveys	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Appraisals	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Environmental Consulting	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Legal	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Construction of Bank	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Sales Commissions (6%)	\$ (21,300)	\$ (21,300)	\$ (21,300)	\$ (21,300)	\$ (21,300)	\$ (21,300)	\$ (21,300)
Project Mgmt Fees	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Monitoring Costs	\$ (25,000)	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Maintenance	\$ (20,000)	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Long Term Stewardship	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
TOTAL CASH OUT	\$ (66,300)	\$ (21,300)	\$ (21,300)	\$ (21,300)	\$ (21,300)	\$ (21,300)	\$ (21,300)
CUMULATIVE NET CASH FLOW	\$ 784,600	\$ 1,118,300	\$ 1,452,000	\$ 1,785,700	\$ 2,119,400	\$ 2,453,100	\$ 2,786,800
CUMULATIVE IRR	-19.43%	-9.87%	-3.13%	1.75%	5.38%	8.15%	10.28%







Wetland Credit Supply

Basin	Years	Credit Sales		Years	
		Credits	per Year		Remaining Credits
Altamaha	13	(4,647.00)	(357.46)	6,641.00	18.58
Coosa	13	(120.60)	(9.28)	15.86	1.71
Etowah	15	(375.50)	(25.03)	307.12	12.27
Lower Chattahoochee	14	(874.44)	(62.46)	833.03	13.38
Lower Flint	0	-	-	0.00	-
Lower Savannah	19	(2,139.00)	(112.58)	1,281.00	11.38
Middle Chattahoochee	19	(873.02)	(45.95)	113.00	2.46
Ocmulgee	20	(1,070.00)	(53.50)	143.27	2.68
Oconee	15	(470.79)	(31.39)	70.80	2.26
Ogeechee	20	(4,084.00)	(204.20)	3,473.00	17.01
Satilla	13	(1,676.00)	(128.92)	4,956.00	38.44
Tidal	20	(752.09)	(37.60)	574.00	15.26
Tennessee	10	0	-	19.40	-
Upper Chattahoochee	13	(67.99)	(5.23)	201.53	38.53
Upper Flint **	13	(4,715.58)	(362.74)	3,094.00	8.53
Upper Flint **	13	(4,715.58)	(43.00)	3,094.00	71.95
Upper Savannah	13	(87.06)	(6.70)	0.67	0.10
Withlacoochee	17	(3,048.00)	(179.29)	4,495.00	25.07

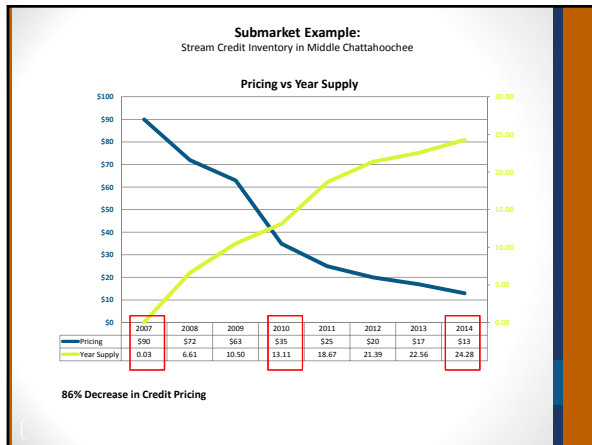
**Skewed due to Magnolia Swamps Service Area Change. Basin typically only average 43 wetland credits until service area change.

Healthy Markets to invest in are typically around 5 – 7 years of supply

Stream Credit Supply

Basin	Stream				
	Years	Credits	Credit Sales per Year	Remaining Credits	Years
Altamaha	13	(197,384.00)	(15,183.38)	698,561.00	46.01
Coosa	13	(235,923.00)	(18,147.92)	303,611.00	16.73
Etowah	13	(417,274.00)	(32,098.00)	661,703.00	20.62
Lower Chattahoochee	13	(161,373.00)	(12,413.31)	314,774.00	25.36
Lower Flint	0	-	-	0.00	-
Lower Savannah	13	(105,540.00)	(8,118.46)	86,172.00	10.61
Middle Chattahoochee	13	(398,677.00)	(30,667.46)	1,120,696.83	36.54
Ocmulgee	13	(281,307.00)	(21,639.00)	953,520.00	44.06
Oconee	13	(316,056.00)	(24,312.00)	507,927.00	20.89
Ogeechee	5	(18,446.00)	(3,689.20)	197,934.00	53.65
Satilla	0	-	-	0.00	-
Tidal	0	-	-	0.00	-
Tennessee	10	(4,917.00)	(491.70)	27,868.50	56.68
Upper Chattahoochee	13	(308,806.00)	(23,754.31)	643,772.00	27.10
Upper Flint	13	(210,695.00)	(16,207.31)	666,483.00	41.12
Upper Savannah	13	(202,491.00)	(15,576.23)	323,257.61	20.75
Withlacoochee	13	(28,891.00)	(2,222.38)	12,226.75	5.50

Healthy Markets to invest in are typically around 5 – 7 years of supply



Why is year supply of credits important?

- Appropriately priced mitigation reinforces avoidance & minimization
- Financial bank failure can lead to regulatory bank failure
- More efficient allocation of regulatory resources

MARKET CHALLENGES

Regulatory

Standard Service Areas
SOP Credit Generation
Success Guidelines
Mitigation Hierarchy Preferences (Key Personnel)

Market

Supply – Existing Banks, Future Competition, Barriers to Entry
Demand – Historical Sales, Future Estimates, Demand Drivers

Project

Bank Approval
Implementation & Maintenance
Monitoring & Performance Standards

{ 31 }

FUTURE OF BANKING IN GA

1. Definition of “Waters of the United States”
2. Trump Administration Changes
 1. Infrastructure Bill
 2. Faster permits
 3. Pro Mitigation Banking?
3. SOP “No Net Loss” Fix
 1. USACE currently working on fix
4. GIS Enforcement
5. New Credit Programs
 - a. USFWS – Darters, Bats, Migratory Birds, etc.
 - b. NMFS – Essential Fish Habitat, others
 - c. DOI currently curbing most of these programs?

{ 32 }

Contact Information

Matt Peevy
Mitigation Management, LLC
www.mitigationcredits.com
(404) 376-4698
matt@mitigationcredits.com

{ 33 }
