Sustainability

System	Needs, Considerations, and Additional Comments	Goals/Actions
Government - Policy	Zoning, rule, reg. changes (MVP - implement recs)	Identify process for accomplishing actions
	Zoning changes needed to positively impact natural resources	Implement MVP plan
	Town meeting approp - bonding open space purchases	Restrictions on new Title V systems
	Enforcement + fines, consequences	Merger of regulatory bonds for Title V systems
	Town is serious - interdepartmental meetings	Cont. of MVP grant app-town/tribe under 319
	Need plan for realizing com plan (who does what, when; benchmarks-how do we measure success; accountability -->need to account for things that should be done, "report card" to show what has been done; assign specific tasks to people	Water District and combine or use as model for wastewater district
	Policy - management plan and expense sustain	For replacements, install IA and create grant/loan program for those who need it
	Utilize county resources	Adopt, promote, and enforce the stretch code (if not done already)
	Balance affordable housing needs w/ open space (interface between urbanization and natural systems)	Proper siting of developments (limit)
	Energy efficiency, resilience to climate change, mitigate and prevent impacts of climate change	Proper siting of solar panels (put solar on all Town buildings)
	Assess Mashpee's progress [on open space] relative to the rest of the region	Adequate permitting and zoning minimizing and mitigating developments impact on natural resources (cut 100 trees, plant 100 trees in same natural system)
	Strict interpretation of harship requirements defined in the zoning act	Create a citizen patrol for pollutants
		Rectify internal regulatory conflicts
		Utilize new stormwater/rainfall data that's reflective of increased rainfall due to climate change
		Remove discretionary language from zoning such as findings relative to "substantially more detrimental to the neighborhood"
Government - Committees	Have active + full committees - EOC (Enviornmental Oversight Committee), residents	Open Space and Rec Committee
	Boards that follow and enforce rules/regs/bylaws in place	Incentive-tax-work off-abatement for committee service
	ZBA-appointed v. elected	Create time table for actions + ability to report back
	Term limits	Environmental Oversight Committee - reconvene to deal with issues + needs
	Possible on appointed board positions to ??	Sewer Committee also needs to reconvene
	Committees working together	
	Coordination --> system	
	Liasons don't show up	
	Groups don't talk to each other	
	Why do these groups stall? What resources do they need? What motivation?	
Conservation Department	Need adequate budget and staffing	Enhance DNR ability to test for cyanobacteria and toxicity in house
Government - Staff	Involve students - use knowledge + abilities - bring them in! (Diversity of age brings perspectives)	Bolster hiring process
	Look at why people are not involved: communication, what are board members working on?, what are they thinking, share knowledge, transparency, how do people get info?, how do we get people involved, postcard	Hire adequate staff - Public Outreach Coordinator
	Americorps, Town Conservation, Planning staff, and DNR	Hire sustainability officer
	Assess staff capacity	Staff Open Space Planner
		Grant writer-town (2)
		Expand town staff to enforce and educate
		Internships (2)
		Town Communication Director
Government - Communication/Collaboration	Outreach and integrate, include Wampanoag tribe in land use decision-making	Acknowledge that this was Wampanoag Land + ensure equitable participation, invitation
	Interdepartmental communication prioritization	"Get to Know Mashpee" Info Center (at Chamber of Commerce? Post Office? Town Hall?
	Collaborate w/ regional partners to address Natural System priorities	Improve Town website to enhance user-friendliness (consider new hosting platform)
	Outreach - in general	Work with state reps, science institutions
	Cape Cod Commission - resource	Communication - Townwide social media
	Local companies - Chamber of Commerce	
	More collaboration - town and tribe and other towns	
	Human resources and outreach	
Government - Education	Americorps	Hold public field trips to natural areas to educate people (schools do this)
	Public education	Link resources (EPA/Local Groups) so citizens can learn about what is going on - share info
	Better signage, receptacles, public education for trash	Info promoted by Town
	Land steward program	Expand land steward program to include water
	Educate community on available resources + opportunities for resources	Map restrooms, pumpouts, boat washes, public access
	Do we have the unification of political will, town consensus, and administration for implementing open space and/or other goals?	Included in school's curriculum
	Public will vs. political will	Constant education for public issues and funding
		Public education office hours
Government - Funding	More political will to achieve common goals	Economic analysis designed to determine feasibility of priority actions
	Tax credits	Get grant funding to support projects
	Grants - county, state, federal	
	Community Preservation grant - CPA	
Mashpee (2)	Uniqueness of Mashpee --> Different and why people come here	Declare Mashpee Nitrogen Sensitive Area
	Emphasize Mashpee in context of CCC Plan	
	Why people come here: trails, bike paths/trails, "Rural" aspect	
Civic Association	Advocate for policies community wants to see implemented	
Land Trust	Native Land Conservancy, Trustees Reservation, ORENDA Wildlife Trust	More Mashpee based
S Harbor Management Plan	Stormwater management	
Docking	Managing seasonal/tourism	
Wastewater/Septic (2)	Implementation	
	Need to manage WW - All Title V - affects ability to breathe	
Green building (3)	Interface between development/built systems and natural system	Prioritize protection of old growth [forests?]
	New green buildings/LEED certification	Green construction/renovations
	Balance affordable housing needs	Halt/Connect building to water quality
	Natural lawn care/native vegetation, pollinators, worms	Explore moratorium on building IA systems until systems are functioning (water quality - make sure development is tied to natural resources)
	Less water intensive	Advocate for solar in appropriate areas (roofs, carports, disturbed areas)
	Need a future land use plan (consensus on what build out is + population)	Inventory parkinbg lots and stormwater management required for green infrastructure
	Reduce heat island effect	Restrict building to manage septic pollution by enforcing and updating regulations
	Buffer/greenspace in parking lots	
Climate mitigation	Recognizing rising water temps. (algae growth, fish migration patterns)	Rain gardens/swales/buffers
	Air pollution	Tradeoffs of offsite mitigation (could be used to support restoration)
	Grasses (American beach grass)	
	Manage resiliency and climate change	
	Increase rain event	
	Wooded buffer zones	
	Solar panels	CO2 - Net zero increase
	Impacted by traffic	Limiting nitrogen ~ net zero increase, including lawns and golf course limit

Air (3)	Being downwind of coal-fired plant	Increase EV stations
	Electric cars, walk ~ pedestrian pathways, electric charging systems	Hybrid/EV Town vehicles
	Bike path for community	Develop more bike paths/continuous network
	Woodlands	Require dust control/watering of construction sites and street sweeping
	Traffic mitigation and control	
	Avoid stopped traffic, drivethrough	
	EV school buses	
	Public fleet	
	Good quality	
	Dust particulates/large trucks (wheelwashs/streetsweeping/watering)	
Access to natural systems	Need better signage	

Water

System	Needs, Considerations, and Additional Comments	Goals/Actions
Water quality	Moved shellfish from Mashpee River	Shellfish seeding programs, encourage this
	Dredging or other mechanism for improving water quality	Go after grant funding (hire person)
	Preventative measures for water quality that is currently good (boats, clearcutting, septic, rights of nature, policies protecting systems that thrive)	
	Mashpee Water District Program and concerns about water conservation	
	People value nat. system but don't necessarily understand science behind water quality	
	Things go downstream (plastic bottles)	
	Seasonal + year-round have diff perspectives (tribal as well)	
	Landscaping	
	Make water quality more upfront and accessible as well as Herring Counts	
Drinking water/water wells (2)	Wells polluted by AF Base	Protect drinking water; promote hookups for public water
	Needs to stay safe	
	So much pollution in ground-water	
	Preserve better with use of non-drinking water grade water for irrigation, etc.	
	Private drinking water wells at risk	
	PFAS - Military Base (What is being done?)	
	Preserve the quality of Town drinking water	
Water Use		Regulate/manage golf course water use
Groundwater	Improve waste systems to ensure groundwater protected from nitrogen and pharma. drug waste, and household chemical waste	
	Groundwater/aquifer conditions	
Wastewater/Cesspools/Stormwater	Septic systems/Town sewer (2)	Install Town sewers (clarify plans, accelerate the installation)
	Need regional solutions to particularly septic	Replacement of existing septic systems (strengthen requirements)
	Manage stormwater (2)	Ban continuance of cesspools
		No cesspools
		Carry through/follow up on 2015 approved WNMP (sewer plan); adjustments for phosphorus removal within 300' freshwater ponds
Nutrients/Pollutants (3)	No encroachment on natural systems, especially groundwater; wastewater, fertilizer and run off impacts so to protect groundwater and open water	Need grant funding to pay for IA system (Fed/State CSSCP)
	New IA systems mitigate phosphorus	Require nutrient removal waste systems and maintenance
	Eliminate nutrient rich runoff	Idea: Solar power boats floating through polluted water filtering out pollutants (nutrients)
	Nitrogen pollution	Consider a restrict/enforce on fertilizers (non-naturals)
	Phosphorus pollution	Consolidate parking to reduce pollution (parking garage - above/underground)
	Petroleum products	Reduce asphalt/permeable pavement
	Bacteria	Drainage - improved filtration for nutrient removal + other contaminants (stronger enforcement by appropriate entities/maintenance)
	TCE	Local program to assist w/ I/A systems --> forgiveable loans, grants, tax breaks, etc.
	pH of water	Enforcement reduce nutrient pollution
	Pollutants on tide --> move out --> impact ocean (shellfish)	Nutrient management
	PFAS/emerging contaminants (wells offline - impacts to recreation and ecology)	
	Sewage dumping	
	Lack of pump out stations	
	I/A septic opportunity	
Floodplains	A resource	Update floodplain hazard maps as necessary to enable flood management by town and county
	Preserve	Stronger enforcement of floodplain management
	Enforce existing laws and rules	
	500 yr floodplain preservation essential to adapt to SLR	
	Variance such be exception not rules	
	Education on flood hazard mitigation and resilience	
Coastal Zones	Sea level rise	Limit development/stricter zoning
	Erosion erosion	Town to purchase and require as mitigation offset/increase buffer
	Increasing vegetated buffers to any waterbody/wetlands	Money to maintain
		Money to expand
Fresh and salt water beaches/Water Access	Destroyed each season by erosion and people	Should be accessible
	Marshes that are polluted and are draining to the bay	Other beach access could be developed "Cousins Beach" (Existing beach is small)
	Water quality @ beach	Trolley or shuttle to beaches
	So much development on water limits access	Provide public restroom facilities
	Frequent closing pond beaches because algae and nutrient flowing in rivers, oceans, ponds	Increase public access to shore/recreation (map and educate public)
	Identify, document, preserve, educate	More access to waterways (public education)
	Public ways to water (Great Ponds)	
	Places to walk/kayak - need to connect to water quality	
Boating/Fishing	Mitigate stormwater on boat ramps	Establish boat washes and bathroom facilities
	Establishing blue economy	Boat ramp runoff - lack of boat washes (none on the Cape)
Ancient Ways	Identify, document, preserve, and protect; make info public, clearly mark in the field (Chuckie Green)	
Bogs (including cranberry bogs) (2)	Encouraging protection along water to swamp or other uses like solar	Restore bogs
	No more cranberry bogs	Restore [Cranberry bogs] to wetlands
Dams	Maintain or eliminate	
	Barrens buck Moth habitat preservation (scrub oak)	
Fresh water systems (2)		

Wildlife

System	Needs, Considerations, and Additional Comments	Goals/Actions
Habitats (e.g., salt marshes, pine barrens) (2)	Protecting Trout Pond, Cottontail, Butterflies	Protect existing habitat
	Enhance habitats to keep woodland systems healthy	Expand preserves
	Locally mapped priority habitats and natural resources	Development mitigation
	Take local control of mapped priority habitat and protect with local rules and zoning bylaws	Preserve wildlife habitat and revitalize land such as bogs
	Invest in tree/habitat health	More appropriate management (controlled burns)
		Schedule and promote controlled burns
		Barrens buck Moth habitat preservation (scrub oak)
Trees/Woodlands	White cedar protection (significant ceremonial; some dying tree)	Write tree bylaw to protect trees
	Minimize fire hazards, control burns, and debris removal	Reduce clear-cutting
	Tree management/land clearing bylaw	Prohibit clear cutting
		Rules and zoning to protect trees
		Bylaws-clear cutting limits --> retain trees
		Appropriate bylaws to preserve + protect trees --> bind DPW to strict rules
		Buying and protecting woodlands
		Restrict tree/clear cutting
Rivers (Mashpee, Childs, Santuit, Quashnet) (2)	Mashpee, Quashnet, Santuit Rivers are dying	Child's River restoration
	Quashnet unappreciated	Mashpee River remediation
	Red brook, Santuit	Limit development; stricter zoning with increased buffers
Lakes and Ponds (Mashpee, Wakeby, Santuit, Johns, Ashume, Trout) (3)	Lack of facilities at ponds/lakes (no restrooms, no garbage cans)	Limit power boats/Permits cost
	Horsepower?	Stricter zoning w/ increased buffers
		New bylaw for valuation of boats
Wetlands (3)	Limit development	More education re: wetlands, w/ sea level rise, wetlands
	Continue wetlands restoration efforts (Quashnet, Childs River, Bogs)	
Bays (2)	WAQ + POPP	
	Shellfish - Eelgrass is gone (2)	
	Poor dev't + overdev't around water	
	Need to do more than maintain - need to renew natural systems	
Swamp	Swamp protection, acting as natural filter	Protect wetlands, swamps from development
	Wetlands, swamps = flood protection	Protect swamp off of Old Barnstable Rd
	White Cedar swamp	
Estuaries	Hatchies	
	Eel grass	
	Shellfish	
	Funding for shellfish	
Vernal pools (3)	Vernal pools in people's backyards serve as habitats	
[Local/Native] Fauna (2)	Turtles, terns, piping plovers, otter, oysters, ospreys, hawks, turkeys, geese, owls, bats, otters, butterflies	
	Fish kills (cyanobacteria)	
	Species protection (little brown bats, cottontail, box turtle)	
	Bird sanctuaries	
[Local] Flora/Native Plants (2)	Milkweed to attract butterflies	Incentives for indigenous/diverse tree planting, including tree bank/fund, municipal programs, zoning changes, subsidies for plant for homeowners
	Use of native plants in landscape (pollinator gardens, uses less water, rain gardens)	Promote use, sale, access at nurseries to native plants, and encourage nurseries to avoid selling invasive plants
Migration Pathways	Identify, map, document migration pathways	
	Protect migration pathways	
Pest/Invasive Species Management (4)	Natural/non-poisonous methods	Cattails or similar indigenous plants, better invasive species management
	Biomagnification	Identify/catalogue diseases/invasives/insects
	Non-harmful to ecosystem/existing pop. Wildlife	Educate/create a grassroots approach to managing invasive species
	Manage invasive species	Create community events around invasive removal
	Invasive species (land and water)	Youth internship program
	Improper use + impacts; control/enforcement	

Open Space

System	Needs, Considerations, and Additional Comments	Goals/Actions
Natural areas/Historically important natural systems (3)	Natural areas for recreation, enjoyment	Maintain natural recreation
	Not much undeveloped land	Education on where natural systems are
	Identify, document, and preserve areas important to Mashpee Wampanog Tribe & Mashpee History	More money and education-resources
	More land to protect rivers	Eliminate special permits
	Woodlands	
	Preservation of all natural resources	
Open Space/Parks (3)	Removal of trees on open space	Purchase/conserve open space
	Public open space amenities	Continue open space acquisitions
	Serves as important habitat/species (invasives/pressure on ecosystem)	Internal infrastructure to facilitate open space acquisitions
	Mashpee Wildlife Reserve	Update Open Space Plan to qualify for additional funding opportunities
	Trash	Restore open space parcels to function as naturally intended - remove invasives (Need: staff, funding, volunteer engagement, CPA funds available)
	Manage new development	Buy open space (revitalize committee)
	Fertilizer on rec fields	Buy forested open space; preserve trees (even in developments, cut 100 trees, plant 100 trees in same natural system)
	Open space acquisitions - blocks access to cons lands	ID priority land for open space
	Competing development pressures on the growth of open space	Maintain current open space
	Open space goal = 50% non-developed (2)	Connect open spaces
	Open space - town/tribe	
Intersection between recreation and conservation (ie. trails and walking paths)	Some are protected in perpetuity	Develop more parks
	Consider adding facilities to allow residents to better utilize conslands for passive recreation (toilets/bathrooms)	Put info on web (trail map)
	Maintenance and improvement of trails, document history of the trails	Keep trails, block access vehicles (prevent dumping & enhance rules)
	Seasonal use of trails (ticks/hunting season)	Map of trails
Community Garden		Composting @ comm garden
		Enhance education around disposal of household organics
Agriculture	Agriculture --> Aquaculture	
Golf courses	Fertilizers	
Complexes	Insecticides	
Natural Landscaping (Pollinators)	No fertillizers/insecticides	Require native species/plantings for Town projects requiring landscaping
Buffer zones	Larger wooded buffer zones between nature & built systems	Maintain public access to the water/rec