MAS has joined with the Marin Chapter of the Native Plant Society in sending a letter to Marin Water (District) presenting why an Environmental Impact Report (EIR) is needed to evaluate the environmental impacts of its planned Recreation Plan on the natural resources of the watershed. Our letter describes how recreational uses are affecting the watershed, its habitats and wildlife, and are not complying with the District’s primary purpose: “to provide high quality water to customers and to manage natural resources in a manner that will accomplish that goal.”

The Mt. Tam watershed is a natural wildland of great biological diversity, as the District’s own policies (Policy 7) state: “Besides its primary purpose, the watershed is held in trust as an area of great biological diversity, as scenic open space, an area for passive outdoor recreation….” Recreation activities are significantly degrading the Mt. Tam environment and we do not want that degradation to increase as a result of the proposed Recreation Plan. The watershed is at capacity for trails and recreation activities.

Need for environmental review:

The California Environmental Quality Act (CEQA) provides that an EIR be prepared if there is substantial evidence that a project may have a significant effect on the environment. Our letter presents current and potential environmental harms to the watershed’s...
**President’s Letter**

*By Barbara Salzman*

We’re beginning to focus on protecting the Lower Novato Creek Baylands by preparing a Novato Creek Baylands Strategy. With the EIR for the Marin Section of State Route 37 due this summer, there are both risks of damage to, and opportunities to protect the lower watershed. Caltrans is planning to raise the SR 37 bridge over Novato Creek, but they do not appear to be planning to address the SMART tracks or other structures that currently exist under the Novato Creek Bridge that would impede the flow of tidal waters expanding to the north. Our goal in preparing the Strategy is to restore as much as possible of the extensive diked baylands to tidal marsh. The bay in this area once extended to the base of the hills, until levees were constructed around the marshes for agriculture at the turn of the 19th century, leaving all of the historic marshes diked. Most of the diked baylands are owned by the Marin County Public Works which has to manage the extensive levee system to prevent flooding of adjacent roads and lands. Marin Audubon owns several parcels. We’ll be working with the Department of Public Works and San Francisco Estuary Institute to prepare the Strategy to protect and restore to tidal marsh as much of the diked baylands as possible. The Strategy will be an overall plan for the area as well as plans for some specific properties, including biological and geotechnical studies that would further restoration of the watershed. This is an extension of our past Campaign to Protect Baylands that enables us, in partnership with Marin Baylands Advocates, to purchase, permanently protect and restore bayland habitats. Through this Campaign we have permanently protected forty large and small bayland properties and restored some of them to wetland habitats.

We’re still spending considerable time, with legal assistance, trying to work out the issues on two of our properties. Both cases have to do with access. We’re hoping at least one will be settled soon. Not so sure about the other.

It’s nesting season so be on guard! It’s NOT the time to cut or trim your trees and shrub vegetation. You might unknowingly destroy a nest. Some nests are tiny and well hidden, so even if you look you might not see them. To ensure birds nesting in your yard are safe, delay your tree and shrub cutting and removal until nesting season is over, generally mid-August.

Thank you to Mary Jane Schramm for her article on wind energy. Mary Jane spent more than 40 years in the field of marine conservation for NOAA’s Gulf of the Farallone’s National Marine Sanctuary.

You should be receiving our Spring appeal letter later in April or early in May. Contributions to this appeal are dedicated to support and enhance habitats on our properties. We appreciate your generosity.

Please join us for our Annual meeting on Thursday May 18 at 7 PM on Zoom. **Note new date** – third Thursday, May 18.

*continued on page 6*

**Clouds on the Horizon: Offshore Wind Energy Development**

*By Mary Jane Schramm*

Both federal and California state governments now mandate a shift from carbon-based energy: praiseworthy in theory, but problematic in implementation. As we face the incontrovertible effects of greenhouse gas climate disruption – fiercer, wetter storms, and longer, more severe droughts generated by the warming of our oceans and atmosphere, reliance on carbon-based energy is giving way to alternate “clean” energy sources – a suite of them, to wean us from our carbon dependence. Each source carries benefits and drawbacks that must be identified and evaluated.

President Biden’s “30x30” directive includes securing 30 gigawatts of offshore wind energy by 2030. California’s Senate Bill 100 demands that by 2030, a minimum of 60% electricity be generated by ramping up “eligible renewable energy resources (solar, wind, geothermal, biomass, small hydro, renewable methane, ocean wave or thermal, or fuel cells using renewable fuels).” The new goal is to “Accelerate and Deploy Offshore Wind Energy and Jobs.” Our leaders point out the many added benefits: strengthening the domestic supply chain and expanding business opportunities – a boon to the nation’s ailing steel industry.

Ranks of turbines could suppress upwelling of nutrient rich water
**MAS FIELD TRIPS**

**Open to the public**

MAS is providing a full schedule of free field trips for the 2023 season.

Advance registration is required for most or our trips, nearly all which have size limits to prevent overcrowding. Registration will open 10 days prior to the trip date on the Marin Audubon website’s Field Trips page.

Trips can fill up quickly. Please register early to make sure you get a spot. If you won’t be able to attend a trip that you have registered for, please use the “contact organizer” button on the Ticketbud trip description page so that the spot may be opened for someone else. If a trip is closed when you try to register, use the “contact organizer” button and request to be put on the waiting list.

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**THE PONDS AT THE LAS GALLINAS VALLEY SANITARY DISTRICT (LGVSD), San Rafael**

Thursday, May 4, 2023
8:30 to 11:30 AM
With Sande and Bob Chilvers

All participants are welcome to join this trip. No registration required.

Beginning birders are especially welcome on the first Thursday of each month for a leisurely walk around the Las Gallinas ponds. Join our friendly leaders as we search for waterfowl, waders, songbirds, raptors, and shorebirds.

Bird enthusiasts of all levels help each other to find and identify the birds, and there are usually several experienced birders to assist. You don’t even have to arrive on time because we spend the first 30 – 60 minutes studying the birds around the first pond and the group is easy to find. Heavy rain cancels.

**DIRECTIONS:** From Hwy 101, exit at Smith Ranch Rd. Drive east on Smith Ranch Rd toward McInnis Park. Turn left immediately after crossing the railroad tracks and drive about 0.5 mile through the LGVSD gates and into the parking lot at the end of the road. Meet the group by the bridge just past the parking lot. There is an outhouse in the parking lot for public use.

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**MOUNT BURDELL/STAFFORD LAKE OR RUSH CREEK**

**Novato**

**Birding in Marin, Season 8 – Trip 5**
Saturday, May 6, 2023
8:30 AM to mid afternoon
With Jim White and Bob Battagin

Registration for this trip is required. Registration opens Wednesday, April 26, 2023 at 8 AM on the MAS website’s Field Trips page.

Join Jim and Bob for a field trip to the gentle slopes of Mount Burdell where we’ll listen to and observe the impressive variety of songbirds that make this area their springtime home. Species we might see include Lark Sparrow, Ash-throated Flycatcher, Bullock’s Oriole, Lazuli Bunting and Grasshopper Sparrow, among many other possibilities.

In the afternoon, we plan to continue birding at Stafford Lake or Rush Creek.

This will be a moderate hike with many opportunities to look at birds and spring wildflowers. Wear comfortable walking shoes and layered clothing. Bring water and snacks. We will meet at the end of San Andreas Drive in Novato.

**DIRECTIONS:** Take Hwy 101 to Novato, exit at the San Marin Dr/Atherton Ave exit. At the end of the exit ramp, turn left (west) on San Marin Dr. Go approximately two miles and turn right on San Andreas Dr. Drive nearly to the end of the road and park on the street. No restrooms available.

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**THE PRESIDIO**

**San Francisco**

Saturday, May 13, 2023
8 AM to noon
With Josiah Clark

Registration is required for this trip. Registration opens Wednesday, May 3, 2023 at 8 AM on MAS website’s Field Trips page.

The Presidio, part of the Golden Gate National Recreation Area since 1972, provides an excellent case study for the human and wildlife interface in San Francisco. Consulting Ecologist and San Francisco native, Josiah Clark, will share with us both the challenges and opportunities for wildlife and habitat preservation he has observed here.

While the area has benefitted from the protection of the National Park Service and increased funding for special restoration projects, there have also been accompanying challenges brought about by visitors, dogs, pathogens, and invasive plants that have all become more numerous as visitation to the area has dramatically increased.

We’ll meet Josiah at the Baker Beach Parking Lot, then travel on foot to Logos Valley, Mountain Lake Park, and the Presidio Hills before returning to Baker Beach. We’ll watch for signs of seasonal transitions in the area as wintering birds depart and the breeding season begins. A secondary focus for the trip will be habitat plants, some unique to the Franciscan scrub habitat, that Marin birders may not have seen. Heavy rain cancels.

**DIRECTIONS:** From Marin take Hwy 101 south to Merchant Rd. (Exit 439, first exit after the bridge) toward 25th Ave. in San Francisco. From Merchant Rd. turn right onto Lincoln Blvd. Next, turn right onto Bowley St. and right again onto Gibson Rd. Park in the Gibson Rd. parking lot. Parking is limited here, so ride with a friend if possible.

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**BEAR VALLEY AND FIVE BROOKS**

**Birding in Marin, Season 8 – Trip 6**
Saturday, June 3, 2023
8:30 AM to mid afternoon
With Jim White and Bob Battagin

Registration is required for this trip. Registration for the Bear Valley and Five Brooks trip will be open starting on May 24 at 8 AM on the MAS website’s Field Trips page.

Join Jim and Bob on this trip as part of their yearly series of Marin walks. We will start our day at Bear Valley in search of nesting birds. Next, we’ll travel to Olema Marsh and Whitehouse Pool for a look at some different habitats. Our final stop of the day will be Five Brooks where we have a chance of finding Wood Duck at the retired logging pond. We will also look for birds in the Douglas Fir forest.

**DIRECTIONS:** From Hwy 101 take Sir Francis Drake Blvd toward Point Reyes for about 20 miles. At Olema turn right onto Hwy 1. In 600 feet, turn left onto Bear Valley Rd. In approximately 0.5 mile, turn left at the entrance to Point Reyes National Seashore Headquarters at Bear Valley. We will meet at the picnic tables near the parking lot.
natural resources that would occur as a result of recreation activities that would increase with the larger numbers of people encouraged to use the watershed by the Recreation Plan. Activities that would generate adverse impacts include constructing new trails, authorizing additional use activities, connecting existing trails with those on adjacent lands, allowing building more social trails and failing to provide adequate enforcement.

EIRs must also be prepared if there are changed circumstances from previous environmental review. The previous environmental document was the Watershed Road and Trail Management Plan Programmatic Environmental Impact Report (RTMPEIR) prepared in 2005. Changed circumstances over those almost 20 years include the increase in unauthorized trails from 50 to 70 miles; increase stress on the watershed from climate change, new plant diseases, invasive plants, and increased fire risk.

Many environmental harms flow from trails and these must be addressed in an EIR. Harms brought by trails include:

- Providing routes for non-native invasive plants to migrate to uninfested areas of the watershed. Maps show that invasive plant infestations are associated with areas of high recreational use. Bikers and hikers introduce seeds of invasive plants from other areas, The District’s own policies prohibit their employees from spreading seeds by these means.

- Fragmenting habitats, creating barriers for movement or foraging for wildlife. With vegetation removed, there is no cover for wildlife moving or foraging. This a particular concern with the 70 miles of illegally created trails that cause various impacts.

- Impacting valuable wetlands, riparian, and serpentine areas that host special status plants and animals, by trampling vegetation, causing erosion and sedimentation that degrade water quality. And by the introduction of soils, nutrients, and pathogens that degrade water quality and alter surface water drainage pattern. Trails also expand opportunities for off-trail use resulting in more destruction of vegetation and harm to wildlife through collisions and habitat degradation.

- Introducing human presence into habitats some of which are remote, untrammeled or seldom visited areas, which also expand opportunities for off-trail use resulting in more destruction of vegetation and harm to wildlife through collisions and habitat degradation.

- Introducing human presence into habitats some of which are remote, untrammeled or rarely used before trail construction. Humans bring noise and smells that signal threat, adversely affecting special status species and other wildlife, and litter that degrades habitats.

Four applicable resource impact literature reviews are included in our letter. One is particularly relevant: Annes D to SEMBCO Submission MTB Environmental Impact Study Environmental Impacts of Mountain Biking: 2007 Science Review and Best Practices by Jeff Marion and Jeremy Wimpey. It is therefore discussed here.

Though the paper’s title identifies mountain biking, the selected sections apply to all uses. The paper identifies many impacts of trail uses that alter the activities of animals. Disturbance of wildlife can extend considerably further into the landscape from the actual trail as wildlife avoid the presence of people in their habitat. Loud sounds, off-trail travel, travel in the direction of wildlife, sudden movements can cause wildlife to use precious energy to avoid threats, especially in winter when food is scarce. Moving away from disturbance means they leave preferred habitat and move to secondary habitat that may not meet their needs.

In addition to addressing natural resource impacts the EIR must address the following:

- Compliance with existing plans including the District’s Road and Trail Management Plan, the Biodiversity, Fire and Fuels Integrated Plan which includes policies to protect biological resources of the watershed.

- The need for mitigation. The EIR must analyze ways to reduce overall recreational activities and visitor access to the watershed in order to avoid or reduce impacts. Avoidance is the preferred mitigation.

- Cumulative impacts. An EIR must consider recreational activities together with the cascade of other adverse impacts to the environment that add up to greater environmental impacts. MMWD’s own documents attest to the fact that the density of non-native plant species increases with the amount of human presence in previously untrammeled or seldom visited areas, which leads to an increase in the severity of effects.

There have been suggestions that the District could avoid an EIR by tiering off or supplementing the Programmatic Environmental Impact Report prepared for the 2005 Road and Trails Management Plan. We disagree. That document focused on erosion and sedimentation, and on closing, rerouting or revegetation related to those impacts. It did not analyze the impacts of any recreation activities that were occurring at that time even though there were recommendations to do so from commenters.
The Deer Island Basin Project is located in the city of Novato, on both sides of Novato Creek between Rowland Boulevard and State Route 37, southwest of Marin County Open Space District’s Deer Island Preserve, with the Novato Sanitary District’s facility on the east.

**Background/current conditions:** Around the turn of the 20th century, dikes were erected around Novato Creek’s tidal marshes for agriculture (grazing and growing oat hay), cutting-off Novato Creek from its historic tidal waters. Diking decreased Novato Creek’s tidal marshes by 83 percent (Salomon et al. 2015). Some of the diked baylands that remain have been developed, others are subsided basins used for disposal of wastewater, ponding of flood waters, or for seasonal wetland habitat. In addition, the loss of tidal wetlands and associated tributary channels greatly reduced the tidal prism (the amount of water that flows into and out of an estuary or bay with the flood and ebb of the tide) conveyed by the creek, resulting in channel narrowing, reduced flood conveyance capacity, and upstream flooding. The flow of water through channels keeps them scoured and open, allowing the passage of flood waters.

The massive loss of wetlands has also significantly reduced the habitat for special status species that historically inhabited the Novato Creek baylands. Instead of the once-extensive tidal marsh, the on-site habitats now consists of the Novato Creek tidal channel, associated narrow tidal marsh, large acreage of diked marshes, diked ponds, and adjacent transition zones and uplands.

The diked baylands of the Deer Island Basin currently provide some flood storage capacity for runoff from the surrounding sub-watersheds. The Bird Ponds (Heron’s Beak and Duck Bill), also are part of the Novato Flood Control system and can detain stormwater flows entering from the Lynwood Basin and/or Novato Creek during high flow events.

**The Project:**

The 201-acre Project is expected to restore tidal connectivity to the diked historic tidal wetlands. These restored tidal wetlands will provide ecologically valuable habitat for endangered species, for special status species and known to occur, currently and/or historically, within Novato Creek and its associated tidal marshes. Flood control benefits will include increasing the flood flow capacity within the Novato Creek channel as a result of opening the diked baylands to tidal action. This will ultimately reduce the flood levels along the creek.

**Specific habitat components of the Deer Island Basin Complex Tidal Wetland Restoration Project, along with flood protection improvements, are:**

1. Restore ecologically valuable tidal wetlands for special-status species by providing full tidal connectivity to the diked areas that were historically tidal wetlands along Novato Creek.
2. Enhance or restore the Bird Ponds, approximately 71.1 acres of tidal wetland and open water, transitional, and upland habitats.
3. Raise the Novato Creek left bank levee to provide improved flood protection on about 6 acres of the roughly 55-acre site in conjunction with the Bird Ponds restoration.
4. Restore approximately 187 acres of aquatic habitat including tidal channels, tidal pond, and tidal wetland habitat in the Deer Island Basin South. Open water tidal pond habitat is anticipated to evolve to mudflat and ultimately tidal marsh and channels in the longer term.

In summary, the project will restore tidal action and enhance ecological functions within existing and historic bayland habitats adjacent to Novato Creek by restoring and enhancing seasonal wetlands. It also is the first step in the restoration of the baylands of Novato Creek.

**WHAT YOU CAN DO:**

Consult Marin Water’s website, their activities and schedule regarding the Recreation Plan. If you would like to become more involved, contact Barbara Saizman at bsaizman48@gmail.com. There is an ongoing group organizing to advocate for the watershed.

**DEER ISLAND BASIN RESTORATION PLAN REVIEW**

The Marin County Department of Public Works has released for public review an Initial Study (IS) for the Deer Island Basin Tidal Wetland Restoration Project, a project that will restore tidal marsh, and associated diked and upland habitat, and improve flood control along lower Novato Creek.
**Habitat Stewardship**

**Tiscornia**

We submitted our next to last Quarterly report to the Ocean Protection Council (OPC) this past month. This grant ends the end of June. We will then transition to funding from our next San Francisco Bay Restoration Authority grant.

The Multicultural Center of Marin is also planning our next public meeting under this OPC grant. We are aiming for Wednesday, May 17, 5 PM to 7 PM as the date for the meeting. We will be explaining the current project, i.e. aspects that have been updated or clarified. Other agenda items are still being decided as the program is still being planned. There will not be another Rail before the public meeting so please check our website or the project website for the link. The program will be presented on Zoom.

**Limonia Removal Update**

After four visits to the Corte Madera Marsh Ecological Reserve by Jude Stalker and a crew of several volunteers, the invasive sea lavender (ISL) removal there was completed on Saturday, March 8! One work day had an unusually high tide after a big rain and they had a lot of fun walking through all of the water. Jude plans a follow up visit in a month or so to get any plants that were missed or have appeared since then.

Jude and the volunteers will continue to remove the ISL at other locations throughout southern Marin and would love to have you join them.

Contact judestalker@gmail.com if you are interested in helping with this project.

**Bahia**

We’ve had our annual meeting with the Bahia Homeowners Association Board of Directors. This is an annual occurrence required by the 2008 Agreement between our two organizations. The issues required to be covered include access and uses on Marin Audubon property, which are restricted to passive uses. The Homeowners own the water of the enclosed lagoon and Marin Audubon owns the uplands surrounding the lagoon except for a small section where the culverts allowing tidal waters to enter the lagoon are located. This year most of the HOA Board members are new. The meeting was cordial. Items discussed included MAS and STRAW revegetation work, repair of fencing, requirement for dogs to be leashed, and possible volunteer work days.

STRAW classes are over and during the summer their staff and interns will be maintaining the plants installed this past winter. We too are gearing up to hire a crew to irrigate the plants installed last year on the Eastern Peninsula.

**Offshore Energy Development continued from page 2**

The sea has become the new frontier with seemingly endless capacity for exploitation, and we now face massive offshore industrialization in some of the most biologically productive waters on our planet, the California Current Ecosystem. It is essential that the most environmentally sensitive areas must be avoided. Already, lease sales have been conducted for select Wind Energy Areas (WEAs) off Morro Bay and Humboldt County. Though active development is still years away, now is the time to ensure that decisions on alternative energy development are made with the environment as a priority.

As with most ambitious projects, the devil is in the details. While stress is given to offshore wind “harvesting” myriad benefits, little emphasis has been given to its inevitable environmental costs. It may be possible to prevent them from becoming disastrous and irreversible, however, by applying the precepts of the Precautionary Principle, i.e., shifting the burden of proof to an action’s proponents; taking preventive action when faced with uncertainty; choosing least harmful alternatives; and increasing timely public participation in decision making.

The Pacific Ocean off the West Coast packs a wallop, with towering swells and wind waves. Our Continental Shelf is deep, requiring floating vs. fixed platforms surmounted by huge turbines. Just 20 to 30 miles offshore, as hazards to navigation they must be brightly lit 24/7 with flashing strobes. They will be moored to the sea floor with multiple cables secured to anchors drilled into the seabed. The engineering used in offshore installations along the Atlantic coast has not been tested here, and some question if these new arrays can withstand what the Pacific dishes out. Despite claims that the cables are “adaptable stress lines” to accommodate wind and surge, rogue waves cannot be engineered for. Platform failure, and even routine maintenance, could result in wildlife-fouling spills of fuel, lubricants, industrial toxins and debris into the sea.

Potential environmental damage also includes: acoustic impacts on marine life impairing their ability to feed, elude predators, mate and communicate; shifts in whale migration patterns, and cable entanglement.

**Invasive Sea Lavender Removal Volunteers**

Through 04/04/2023

Debbie Ablin, Annette Anzalone, Bob Hinz, Martha Jarocki, Ed Nute, Sonya Suzuki, Lowell Sykes

**Thank you, Volunteers**

Debbie Ablin, Annette Anzalone, Bob Hinz, Martha Jarocki, Ed Nute, Sonya Suzuki, Lowell Sykes

**Habitat Stewardship Program**

Italian thistles are beginning to bloom so we will be pulling or cutting them, Radish, mustard, and French broom are other invaders that we can stop before they seed. Putting down some mulch around our native shrubs will preserve moisture for them well into the summer and keep down the weeds.

It’s the green season and it’s comfortable. Marin’s birds and the native insects that nourish their young need your help. Join us on a workday. Doing the work with other folks makes the time go quickly and provides an opportunity to learn more about a native habitat of your county. Make a difference.

**Volunteer Workdays**

**Triangle Marsh, East Corte Madera:**

First Saturdays: May 6, June 3

Meet at 10 AM on Paradise Drive directly across from the Ring Mountain Phyllis Ellman trailhead near the Montessori School.

Corte Madera Ecological Reserve:

Second Saturdays: May 13, June 10

Meet at the end of Industrial Way near Trader Joe’s in Greenbrae.

For up-to-date information, contact Martha Jarocki, marthajarocki@gmail.com or phone 415/461-3592.

**Bahia, Novato:**

If you’d like to help, please contact Jude at judestalker@gmail.com.

**Thank you, Volunteers**

Debbie Ablin, Annette Anzalone, Bob Hinz, Martha Jarocki, Ed Nute, Sonya Suzuki, Lowell Sykes

**Invasive Sea Lavender Removal Volunteers**

Through 04/04/2023

Debbie Ablin
Michael Anderson
Annette Anzalone
Katharine Cagney
Anastasia Ennis
Sonya Hammons
Leila Lancot
Susan Matross
Viggo Mittermaier
Michael Mooney
Linda Nicoletto
Allison Pence
Flinn Rauck
Mary Ross
Steve Ross
Sam Schirmer
Jude Stalker
Ilana Stein
Ilana Stein
Lowell Sykes
March is one of our less-productive months for rare birds in Marin, being awkwardly situated between winter and peak spring, but this month still produced a few nice rarities.

Several rarities continued from the winter into March, but the first new vagrant was a Common Teal on Bolinas Lagoon by Stinson Beach on the 6th (TF). Rare for the Outer Point especially in such numbers, 10 American Crows flew cawing by near the Pt. Reyes Lighthouse on the 7th (CB).

A group of birders obtained special permission to access the closed Redwood Landfill on the 8th, where the best gull was a 1st-cycle pure Glaucous Gull (CC). Rare for the Outer Point, a Belted Kingfisher was at the Fish Docks on the 8th, and a ‘Phoeniceus’ type Red-winged Blackbird (not our typical ‘Bicolored’ type) was also at Mendoza Ranch (DM).

A new Black Skimmer showed up on the 12th at Rodeo Lagoon (WL), adding to the unprecedented incursion of this species into Marin this winter/spring. A few continuing skimmers were also still present through March at other Marin locations. A Common Teal on Bolinas Lagoon by Bolinas around the 13th (KH) may or may not have been the same Stinson Beach bird.

A flock of 5 American Crows passed the Pt. Reyes Fish Docks on the 15th (EG), and a few Outer Point sightings of one or two crows in the following days were probably some of these same individuals.

Very rare away from the few known wintering sites on our highest peaks, a migrant Thick-billed Fox Sparrow was at Bald Hill east of Mt. Tam on the 19th (CC).

Elegant Terns have made an unusually early appearance in Marin and elsewhere around the Bay this late winter/spring, with a few individuals and flocks reported in Marin in March including a high count of 41 at Harbor Cove in Strawberry on the 27th (RH).

A week or two earlier than expected was a Western Tanager at Kule Loklo on the 25th (JG), and 2 Purple Martins flew over Las Gallinas on the 30th (RC).

Observers and Acronyms


Offshore Energy Development

continued from page 6

Electromagnetic fields around installations, and cables linking platforms and the mainland, could confuse sharks, sturgeon and other migratory species that rely on magnetic field navigation. Night-feeding seabirds, notably storm-petrels and their kin can become disoriented by lights and crash into structures or become “entranced” by the lights, ceasing feeding activities in their confusion. In the dark and fog, migratory seabird collisions with huge rotor blades could take a significant toll.

It goes without saying that curbing our power consumption is essential. The luxury of unlimited energy on demand can spur development that is overambitious or ill-considered. We encourage members to inform themselves more about alternative energy options and support those that do not continue to destroy our precious biological resources.

Richardson Bay

continued from page 5

has been awarded by the USEPA Water Quality fund for eelgrass restoration activities over the next 4 years. Sonar surveys were conducted in 2022 mapping the entire extent of the eelgrass. The total area of eelgrass is 956.5 acres, with only 402.6 acres being dense. Density equates the health of the stand. The surveys show that there is continued evidence of scour by anchor chains. Eelgrass is less dense as the water gets shallower and there is no eelgrass below 5 feet depth probably due to lack of light.

The Harbor Master reported on damage from the winter storms. One floating home sunk, three vessels went adrift during the winter storms, one sunk and several landed on shore. The current count is either 48 as reported to the RBRA board, or 52, reported at the BCDC Enforcement Committee meeting on April 13.

Habitat Improvement Grants

This January the California Wildlife Conservation Board (WCB) awarded 3 block grants to the California Association of Resource Conservation Districts, to aid 30+ Resource Conservation Districts across the state and to Point Blue Conservation Science to enhance habitat and steward wildlife-friendly working landscapes as well as Sierra mountain meadows. In the past, Marin Audubon has also received WCB grants, most notably to assist with the restoration of tidal marsh at Bahia. The Marin RCD received almost $500,000 as part of one of the recent WCB block grants. We look forward to these grants establishing hedgerow and shelter belt habitats on agricultural lands in Marin.
Join or Donate to the Marin Audubon Society

Please fill in this form and mail to the address below. If you are paying by check, please make it payable to Marin Audubon Society.

- Enroll me as a Chapter-Supporting Member
- Renewal
- New Member
- $25 Annual rate for students (18 years and under) and seniors (65 and over)
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 Ма́й 2023