

From: Philip Keyes [<mailto:pk@nemba.org>]
Sent: Friday, October 21, 2016 10:31 AM
To: Jahnige, Paul (DCR)
Subject: NEMBA Comment regarding Electric Bikes on Natural Surface Trails

Dear Paul,

Below is NEMBA's comment regarding electric power-assisted bicycles and how they should be managed on natural surface DCR trails.

Please note that while NEMBA believes that e-bikes offer considerable value as part of the transportation mix and offer a solution to city traffic and congestion, we are refraining from commenting about how DCR should manage e-bikes on the numerous paved pathways in the Commonwealth, as this is not our area of expertise. For this, we recommend DCR consult the stakeholders of bike paths, such as the Friends of the Bruce Freeman Rail Trail, as well as the various road bicycle advocacy groups, such as MassBike.

Currently there are [four classes of e-bikes](#). Class 1 e-bikes have a maximum speed of 20 MPG, a motor that is 750 watts or less that is activated by pedaling. Class 2 e-bikes are the same as the Class 1 but may utilize a throttle such as a regular motorcycle rather than be pedal-actuated. Class 3 e-bikes may attain speeds up to 28 MPH, and Class 4 e-bikes may have motors greater than 750 watts and attain speeds up to 28 MPH, similar to mopeds. Most current electric mountain bikes fall into the category of Class 1.

Regarding e-bikes on DCR natural surface trails, [NEMBA's position on power-assist bicycles](#) is the following:

The recreational use of electric and power-assisted bicycles, ORVs or ATVs on natural surface trails should be managed using the same guidelines and policies as other motorized vehicles.

We base this position on the following:

- Mountain biking is a human-powered form of recreation.
- E-bikes use electric motors to propel the bike and are *de facto* motorized bikes. It does not matter that they are power-assisted or that their throttle is controlled by pedaling. E-bikes are motorized and should be managed as such. E-bikes are "motorbikes."
- The Federal Bureau of Land Management (BLM) issued a [directive to all of its Field Offices](#) to let them know that the BLM classifies e-bikes as motorized and only allows them on motorized trails. The US Forest Service also [manages electric bicycles as motorized](#).
- All of the State Parks in New England (MA DCR, NH DRED, ME BPL, RI DEM, VT FPR and CT DEEP) currently manage e-bikes as off-road motorized vehicles. The USFS in the White Mountains only allows them on trails open to snowmobiles during snowmobile season. Other places, like Mt. Agamenticus Conservation Area (ME) and Massabesic Watershed/FOMBA (NH) and the Kingdom Trails (VT) do not allow them on non-motorized trails.
- NEMBA agrees with the International Mountain Bicycling Association's [2010 position on e-bikes](#): "...the use of a motor, whether internal, combustion or electric, would require changing the classification to a motorized use. IMBA would support the use of e-bikes anywhere that we could also support other motorized uses" NEMBA also agrees with [IMBA's public comment](#) that "mountain biking should remain a non-motorized activity. Therefore, we conclude that riding e-bikes on natural-surface trails is not mountain biking. Further, we state that e-bike regulation for off-road travel should fall under motorized land management policies and rules."
- The underlying management of trail recreation is based upon differentiating motorized and non-motorized forms of recreation. Some are proposing to create a third category of trail use to allow e-bikes on some but not all non-motorized trail systems. This is a bad idea for a few reasons. First, it will be unwieldy and very difficult to manage in practice, especially since the motorized

bikes look quite similar to regular bikes. Second, some e-bikes are being marketed as “stealth”, meaning no one can tell that they are e-bikes so that they can be ridden anywhere, legal or not. Third, this still ignores the speed differential, safety and user-conflict this will cause in existing shared-use trail systems.

- Class 1 e-bikes can go 20 MPH -- even up hills. This is significantly faster than all other non-motorized trail users and will create significant user conflict and safety issues, especially since the motor is silent. The average speed of mountain bikers on rolling terrain is 5-7 MPH, similar to trail runners, and about twice as fast as walkers. The electric motor powered speed of 20 MPH will create average speeds that are considerably faster than mountain bikes and runners.
- Class 1 e-bikes have 750 watts of power and are required to have a software-based “governor” to restrict their maximum speed. This software can be easily overwritten to allow e-bikes to go much faster than designed. The Internet has [numerous videos showing this](#). NEMBA predicts that there will be a significant “after market” that will develop for performance upgrades to e-bikes that will allow users to remove all “as-sold” restrictions on power and speed limits for e-bikes. This magnifies the importance of keeping e-bikes classified as motorized vehicles and on motorized vehicle trails.

We believe that it is very important for land managers to get out in front of the issue of e-bikes on non-motorized trails. There is little doubt that e-bikes will get faster, lighter, and more powerful as the technology improves. We highly recommend that DCR post “No Motorized Vehicles, including e-bikes” on the kiosks where mountain biking is common. I’m attaching example signage here.

Thank you for letting us comment on e-bikes and please contact me if you have any questions.

Regards,

Philip Keyes
Executive Director
New England Mountain Bike Association