

Small Wheels, Big Moves:

Micromobility in Massachusetts

Close your eyes and picture a scooter.

Which of these came to mind?



A



B



C



D

Which of these is a Motorized Bicycle in Massachusetts?



Which of these is a Motorized Bicycle in Massachusetts?



Final Question: Are these “e-bikes” in Massachusetts?



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MGL: Class 2 E-Bike

Motor < 750Watts, pedal or throttle assist up to 20mph



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MGL: Off-Highway Vehicle*

*N.B. Some e-dirt bikes cannot be registered with MA Environmental Police because they lack WMC/PIN Codes

Tragedy, Device Terms, The Press, and Marketing

NEWS

Boy, 11, dies in crash of electric bicycle in Charlton

Telegram & Gazette

July 11, 2025 | Updated July 15, 2025, 8:09 a.m. ET

● CBS NEWS BOSTON [Follow](#)

E-bike bursts into flames after crash in Bedford

Community mourns 13-year-old killed in Stoneham e-bike crash

WCVB 5 abc

The devices in these crashes were NOT e-bikes according to current law

bike crash in Stoneham

The deadly crash has spurred safety talks on Beacon Hill.

LOCAL

Teenager hurt after a car strikes an e-bicycle in Plymouth



MASSACHUSETTS

E-bike crash that killed boy, 13, spurs safety talk on Beacon Hill

Special Commission on Micromobility

Background

- **Established by the Legislature in November 2024**, to review current laws, provide recommendations on regulations and to support the expansion of micromobility use, including shared options for municipalities
- **Chaired by the Secretary of Transportation** and comprised of Transportation Committee Co-Chairs, EOPSS, DCR, WalkMass, MassBike, small business owners, academics, law enforcement, City of Boston, Town of Amherst, and the Consulting Planners of Massachusetts
- **16 overall recommendations in the final report created by the Commission** to clean up confusion, improve safety, and enable further adoption of this mobility mode
- **New classification system developed with speed as the defining characteristic** to help 'future-proof' the Commonwealth and link rules to risk

The Commonwealth's first Micromobility Potluck

116 ideas and concepts were submitted by Commission members

Resulting in **54 proposals** for review at the 'recommendations potluck'

Refined to a punchy **16 recommendations** in the final report



The 16 recommendations of the Commission

Rec. 1: Legislative & Regulatory Changes

Rec 2: Speed-based Tier Framework

Rec. 3: Micro ID

Rec. 4: Police Training

Rec. 5: Crash Report & Vulnerable User Data

Rec. 6: Default Maximum Speed on Paths

[Rec. 7: Education Campaign](#)

Rec. 8: Automated Enforcement

Rec. 9: Model Municipal Traffic Control Ordinance

Rec. 10: Design Guidance

[Rec. 11: Micromobility Integration](#)

Rec. 12: Funding for Upgrades

[Rec. 13: Expand Bikeshare](#)

Rec. 14: Fund More E-bike Subsidies

Rec. 15: Commercial Use Micromobility Study

Rec. 16: Presumed Liability Study

The Main Course of the Potluck:

Speed-Based Tiers for Device Classification

The Main Course

Introducing the Speed-based Classification Schema

Tier 0 0–20 MPH	A. Human-powered micromobility devices
	B. Powered Micromobility Devices (including Class 1 and Class 2 e-bikes)
	C. Mobility Aid Devices
Tier 1 21–30 MPH	A. Class 3 e-bikes
	B. Powered Micromobility Devices
	C. Mopeds with 2 or 3 wheels
Tier 2 31–40 MPH	A. Limited Use Motorcycles
	B. Powered Micromobility Devices
Tier 3 41+ MPH	A. Motorcycles
	B. Powered Micromobility Devices

The Main Course

Introducing the Speed-based Classification Schema

Device Requirements: What is the device required to have to be street legal?

	Tier	UL Electrical Standard	UL Battery Standard	Lights, Brakes, Horn	Motorcycle Equipment	Speedometer	Stop and Turn Signals
<=20 MPH	0.A: Human-powered	n/a	n/a	■			
	0.B: Powered Micromobility	UL 2849 or UL 2272	UL 2271	■			
	0.C: Mobility Aid Device						
21-30 MPH	1.A: Class 3 E-bike	UL 2849	UL 2271	■ *		■	
	1.B: Powered Micromobility	UL 2272		■		■	
	1.C: Moped^	UL 2849		■ **		■	■
31-40 MPH	2.A: Limited use motorcycle	UL 2849	UL 2271	■ **	■	■	■
	2.B: Powered Micromobility	UL 2272		■		■	■
>40 MPH	3.A: Motorcycle	UL 2849	UL 2271	■ **	■	■	■
	3.B: Powered Micromobility#	UL 2272		■	■	■	■

^ Currently called Motorized Bicycle in MGL ■ Denotes a change from current law or regulation

*Follow the federal motor vehicle guidelines for bicycles ** Follow FMVSS Standards (49 CFR part 571)

Need to follow the motorcycle pathway i.e. FMVSS, VIN etc. or else illegal on public roadways

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Introducing the Speed-based Classification Schema

Device Requirements: What is the device required to have to be street legal?

	Tier	UL Electrical Standard	UL Battery Standard	Lights, Brakes, Horn	Motorcycle Equipment	Speedometer	Stop and Turn Signals
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	0.C: Mobility Aid Device						
21-30 MPH	1.A: Class 3 E-bike	UL 2849	UL 2271	■ *		■	
	1.B: Powered Micromobility	UL 2272		■		■	
	1.C: Moped^	UL 2849		■ **		■	■
31-40 MPH	2.A: Limited use motorcycle	UL 2849	UL 2271	■ **	■	■	■
	2.B: Powered Micromobility	UL 2272		■		■	■
>40 MPH	3.A: Motorcycle	UL 2849	UL 2271	■ **	■	■	■
	3.B: Powered Micromobility#	UL 2272		■	■	■	■

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Introducing the Speed-bo

Tier	n/a
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Speed	Category	Vehicle Type
<=20 MPH	0.A: Human-powered	UL 2849
	0.B: Powered Micromobility	2
	0.C: Mobility Aid Device	
21-30 MPH	1.A: Class 3 E-bike	
	1.B: Powered Micromobility	
	1.C: Moped ^A	
31-40 MPH	2.A: Limited use motorcycle	
	2.B: Powered Micromobility	
>40 MPH	3.A: Motorcycle	
	3.B: Powered Micromobility [#]	

	Powerful Micromobility	Bike Lanes	St
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	Shared Use Paths	Roadways	Limited Access Highways (>40 MPH)
1.A: Class 3 e-bike	■ [†]	■ [†]	
1.B: Powered Micromobility	■ [†]	■ [†]	
1.C: Moped [^]	■ [†]	■ [†]	
2.A: Limited use motorcycle	■ [†]	■	
2.B: Powered Micromobility	■ [†]	■	
3.A: Motorcycle		■	
3.B: Powered Micromobility		■	

[†] Follow local bicycling rules
[^] Currently called Motorized Bicycle in MGL
 ■ Denotes a change from current law or regulation

change from current

le pathway,

Introducing the Speed-bo

Tier	n/a
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▲ Currently called the federal motorcycle

Powerful Micromobility

change from current

cycle in the...
le guidelines for...
away i.e. FMVSS, ...
...law or reg...

le pathway

The Main Course

Introducing the Speed-based

Commission Recommendations

Operational Requirements: What is required of a user?

	Tier	Helmet	Age 16+	License/ Education	Insurance	RMV Registration	State Micro ID /Decal
<=20 MPH	0.A: Human-powered	■ ‡					
	0.B: Powered Micromobility	■ ‡					
	0.C: Mobility Aid Device						
21-30 MPH	1.A: Class 3 e-bike	■	■	Education			■
	1.B: Powered Micromobility	■	■	Education			■
	1.C: Moped [^]	■	■	■ Class D	■	■	
31-40 MPH	2.A: Limited use motorcycle	■	■	■ Class M	■	■	
	2.B: Powered Micromobility	■	■	■ Type TBD	■		■
	3.A: Motorcycle	■	■	■ Class M	■	■	
>40 MPH	3.B: Powered Micromobility	■	■	■ Type TBD	■		■

‡ Bicycle Helmet Law applies to riders ages 16 and younger

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	0.C: Mobility Aid Device						
21-30 MPH	1.A: Class 3 e-bike	■	■	Education			■
	1.B: Powered Micromobility	■	■	Education			■
	1.C: Moped^	■	■	■ Class D	■	■	
31-40 MPH	2.A: Limited use motorcycle	■	■	■ Class M	■	■	
	2.B: Powered Micromobility	■	■	■ Type TBD	■		■
	3.A: Motorcycle	■	■	■ Class M	■	■	
>40 MPH	3.B: Powered Micromobility	■	■	■ Type TBD	■		■

‡ Bicycle Helmet Law applies to riders ages 16 and younger

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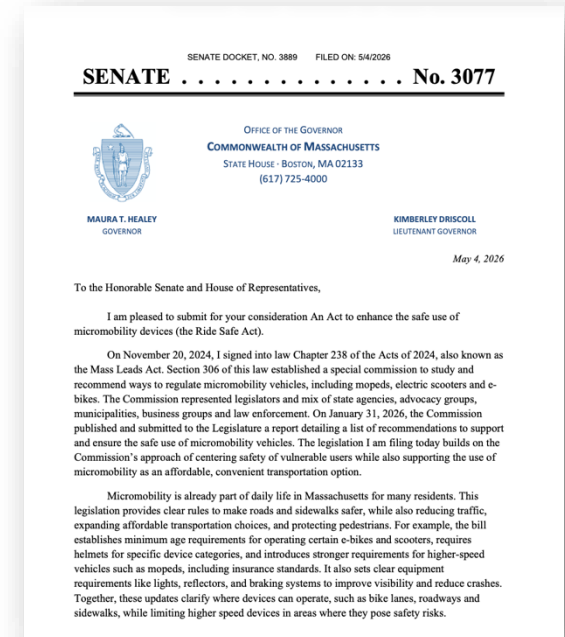
Successful Commission and a bill



**Commission
Report**
(116 pages)



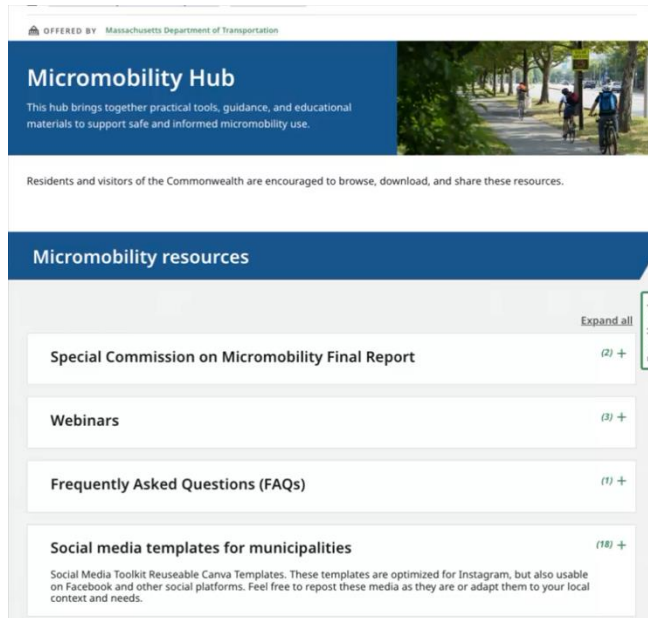
**MassDOT's
Summary Report**
(20 pages)



Ride Safe Act
(14 pages)

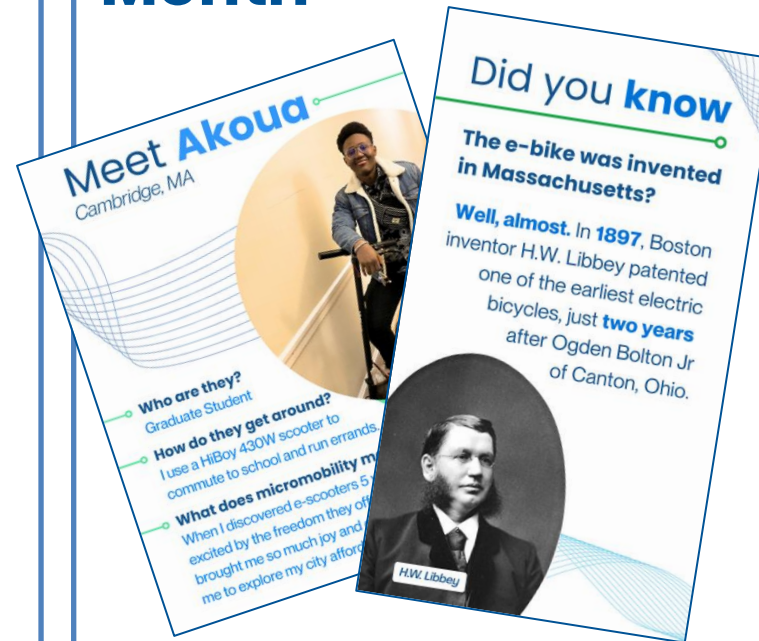
Education, Alliteration, and Tarot Cards

Micromobility Resource Hub



mass.gov/micromobility-hub

March was Massachusetts Micromobility Month



Tarot Cards of Micromobility



Thank You



**Summary
Report**



TheLab@dot.state.ma.us
mass.gov/the-lab-massdot
mass.gov/micromobility-hub