Table 1. EMS protocols across the United States of America (table focusing on pediatric instructions) [including online links to protocols at the end]:

STATE	Statewide protocol available?	EMS type / technician level	BZD included in the protocol? Types, dosage and route of administration recommended? BZD re-dosing instructions or consultation call?	Non-BZD ASM included in the protocol?
	Yes	Basic	No	No
		Advanced/ Intermediate	No	No
Alabama		Paramedic	- Lorazepam 0.1 mg/kg slow IV, max 2 mg Midazolam 0.1 mg/kg slow IV/IM or 0.2 mg/kg IN via atomizer, max 5 mg. * Midazolam IN preferred drug for pediatric patients if available. Suggested phone call if maximum dosage.	No
Alaska	Yes (NASEMSO model)	No divisions on protocol	- Midazolam 0.2 mg/kg IM preferred, or IN (max 10 mg); 0.1 mg/kg IV or IO, max 4mg Diazepam 0.1 mg/kg IV or IO, max 4mg; 0.2 mg/kg PR, max 10 mg Lorazepam 0.1 mg/kg IV or IO, max 4mg. *IN/IM preferred over PR/IV/IO routes. Consider consultation if not trained personnel or 2 doses of BZD administered.	No
	Yes	EMT	No	No
		AEMT	No	No
Arizona		EMT-I / Paramedic	 - Midazolam 0.2 mg/kg IM/IN, max 5 mg if < 40 kg, max 10 mg if ≥ 40kg; 0.1 mg/kg IV slow over 2 min, max 4 mg. - Lorazepam 0.1 mg/kg IV slow over 2 min, max 4 mg. May repeat for total of 2 doses regardless of route. 	No
Arkansas	Yes (NASEMSO model)	No divisions on protocol	- Midazolam 0.2 mg/kg IM preferred, or IN (max 10 mg); 0.2 mg/kg IV or IO, max 4mg Diazepam 0.1 mg/kg IV or IO, max 4mg; 0.2 mg/kg PR, max 10 mg Lorazepam 0.2 mg/kg IV or IO, max 4mg. *IN/IM preferred over PR/IV/IO routes. Consider consultation if not trained personnel or 2 doses of BZD administered.	No
California	No (e.g. Los Angeles County, including Los Angeles city)	No divisions on protocol	-Midazolam (5mg/ml) 0.1mg/kg IM/lV; 0.2 mg/kg IN. May repeat x1 in 2 min (max 2 doses prior to base contact). Contact base for persistent seizure and for additional medication orders. May repeat midazolam as above, max 4 total doses.	No
	No (e.g.	EMT, AEMT	No	No
Colorado	Denver metropolitan area)	EMT-I, paramedic	- Midazolam 0.1 mg/kg IV/IO (max 2 mg); 0.2 mg/kg IN/IM (intranasal preferred) (max 5mg) Diazepam 0.3 mg/kg IV/IO (max 5 mg) Lorazepam 0.05 mg/kg IV; 0.1 mg/kg IN/IM (intranasal preferred). All ASM may be repeated x 1 after 5 min, contact base for > 2 doses.	No

STATE	Statewide protocol available?	EMS type / technician level	BZD included in the protocol? Types, dosage and route of administration recommended? BZD re-dosing instructions or consultation call?	Non-BZD ASM included in the protocol?
	Yes	EMT / AEMT	No, only assist family if RM prescribed (diazepam rectal gel); if VNS, suggest the use of VNS magnet.	No
Connecticut		Paramedic	- Midazolam 5 mg/ml concentration (IM/IN preferred if not IV/IO), 0.2 mg/kg IM/IN (max 8 mg) repeat every 5 min; or 0.1 mg/kg IV/IO (max 4 mg) repeat every 5 min. - Lorazepam 0.1 mg/kg IV/IO (max 2 mg if ≤ 39 kg, 4 mg if >39 kg) repeat every 5 min. - Diazepam 0.1 mg/kg IV/IO (max 10 mg) repeat every 5 min. * Until seizure activity ceases or maximum dose is reached.	No
Dalaman	Yes	BLS	No protocol for seizures	No
Delaware		Paramedic	-Midazolam 0.2 mg/kg IM (if no IV/IO access, max 5 mg); 0.2 mg/kg IV/IO.	No
	Yes	BLS	No No	No
District of Columbia	(district wide)	ALS	-Midazolam 0.2 mg/kg IN (max 5 mg), repeat once in 5 min; 0.1 mg/kg IV/IO (max 2 mg), repeat once in 5 min. Contact medical control for additional doses.	No
	No (Miami-	BLS	No	No
Florida	Dade County, including Miami)	ALS	-Midazolam 0.1 mg/kg IV/IO (max 5 mg); 0.2 mg/kg IM/IN (max 5 mg). May be repeated once in 5 min (max 10 mg). Medical control physician for additional administration of benzodiazepines.	No
Georgia	Not available (Fulton County, containing Atlanta, not available)			
	Yes	EMT	Not clearly specified, restrictions for IV ASM (specific training needed and paramedic's supervision).	No
Hawaii		Paramedic	- Midazolam 2 mg IN or IM (5 mg/ml concentration), repeat dose at 2 min (1st option) Diazepam 1 mg slow IV, repeat dose at 2 min (max 10 mg); PR 0.5 mg/kg if <6 yo, 0.3 mg/kg if 6-11 yo, 0.2 mg/kg if >11 yo (max 10 mg) Lorazepam 0.1 mg/kg slow IV or IN (max 4 mg) (last option). Communicate with base station physician for further orders.	No
	Yes	EMT / AEMT	No	No
Idaho		Paramedic	- Midazolam 0.1 mg/kg IV (max 5 mg); 0.2 mg/kg IM (max 5 mg); 0.2 mg/kg IN (max 10 mg) (IN/IM preferred route if no IV access) Diazepam 0.05 mg/kg IV (max 5 mg); 0.5 mg/kg PR (max 10 mg) Lorazepam 0.05 mg/kg IV/IM (max 4mg). May repeat medications x1 in 5 min.	No
	No	BLS/EMT-B	No	No
Illinois	(e.g. region XI, Chicago)	Paramedic	-Midazolam 0.2 mg/kg IN or 0.1 mg/kg IM (max 5 mg); 0.1 mg/kg IV/IO (< 6 y: max 6 mg) (≥ 6 y: max 10 mg)Diazepam 0.1-0.3 mg/kg IV over 2-3 min, every 5 min (< 5 y: max 5 mg) (≥ 5 y: max 10 mg)Lorazepam 0.1 mg/kg IV/IO, may repeat x1 (max 4 mg); 0.1 mg/kg IM.	No

STATE	Statewide protocol available?	EMS type / technician level	BZD included in the protocol? Types, dosage and route of administration recommended? BZD re-dosing instructions or consultation call?	Non-BZD ASM included in the protocol?
	No (e.g.	BLS	No	No
Indiana	Indianapolis)	ALS	-Midazolam 0.1 mg/kg IV/IM/IN (max 5 mg), repeatable once in 5 min if needed. Contact the receiving facility for further instructions or additional dosing if needed.	No
	Yes	Basic	No	No
Iowa		Advanced	-Benzodiazepine (dosage according to pediatric dosing reference), may repeat dose in 5 min if still seizing.	No
	Yes (sample	EMT-B, EMT-I	No	No
Kansas	protocol)	Paramedic	-Diazepam 0.1 mg to 0.3 mg IV slowly or PR, may repeat in 15 min. Contact medical control for further orders.	No
	Yes	EMT-Basic, EMT- Advanced	No, only assist family if RM prescribed; if VNS, determine if emergency could be related.	No
Kentucky		Paramedic	- Lorazepam 0.1 mg/kg IV/IO (max 4 mg) Midazolam 0.1 mg/kg IV/IM/IO (max 2 mg) Diazepam 0.2 mg/kg IV or 0.5 mg/kg PR (max 5 mg or 10 mg PR). Any of the above may be repeated once in 5 min. May be repeated once in 5 min.	No
Louisiana	No (e.g. Region I, New Orleans)	Any EMT or paramedic certified in this region	-Midazolam 0.1 mg/kg IV/IO (max 5 mg); 0.2 mg/kg IM/IN (max 5 mg). - Diazepam 0.1 mg/kg IV/IO/IM (< 5 yo max 5 mg, ≥ 5 yo max 10 mg); 0.5 mg/kg PR. - Lorazepam 0.1 mg/kg IV/IO/IM, may repeat x1 q 2-5 min. *Midazolam IM first option prior IV access, last resort diazepam PR. *EMS practitioners are under the direction of the highest skilled level practitioner and medical control. Contact medical control for additional orders or consultation.	No
	Yes	EMT, EMT-A	No	No
Maine		Paramedic	-Midazolam 0.2 mg/kg IM (max 10 mg); 0.1 mg/kg IV (max 5 mg), 0.2 mg/kg IN over 15 sec (max 6 mg). *Midazolam IM first option if no IV access. Contact medical control if repeat dosing of midazolam needed.	No
	Yes	BLS	No	No
Maryland		ALS	May assist patients with administration of their prescribed BZD. -Midazolam 0.2 mg/kg IN/IM if no IV/IO (max 5 mg); 0.1 mg/kg IV/IO in 2 mg increments slow IVP over 1–2 min (max 5 mg). IN/IM preferred over IO (consider if seizures refractory to treatment). Additional doses of midazolam (up to max 5 mg) require medical consultation. -Diazepam up to 0.2 mg/kg PR (max 10 mg); 0.1 mg/kg in 2.5 mg increments SLOW IVP/IO/IM (max 5 mg). Midazolam preferred, diazepam if not midazolam available. IM requires all providers to obtain medical consultation.	No
	Yes	EMT, AEMT	No. AEMT can assist family if RM prescribed; and if VNS, suggest the use of VNS magnet.	No
Massachusetts		Paramedic	-Midazolam 0.1 mg/kg IV/IO/IM (max 8 mg); 0.2 mg/kg IN (max 10 mg). Contact medical control for additional doses.	No

STATE	Statewide protocol available?	EMS type / technician level	BZD included in the protocol? Types, dosage and route of administration recommended? BZD re-dosing instructions or consultation call?	Non-BZD ASM included in the protocol?
	Yes	EMT-Basic, EMT- Specialist	No	No
Michigan		Paramedic	-Midazolam according to MI-MEDIC cards or 0.1mg/kg IM (max 10 mg); 0.05 mg/kg IV/IO (max 5 mg)Lorazepam 0.1 mg/kg IV/IO (max 4 mg), may repeat in 5 min, max 0.2 mg/kg total (max 8 mg). *Midazolam IM first election. If seizures persist, repeat midazolam, or lorazepam at the same dose or contact medical control for further instructions.	No
	Yes	BLS	No	No
Minnesota		ALS	- Midazolam IV/IO 0.1 mg/kg IV/IO (max 10 mg), if seizure not terminated within 10 min, additional 0.05 mg/kg IV/IO; 0.2 mg/kg IM (max 10 mg), if seizure not terminated within 10 min, additional 0.05 mg/kg IM; 0.2 mg/kg IN (max 10 mg). - Diazepam 0.1 mg/kg IV/IO/IM (max 10 mg), if seizure not terminated within 10 min, additional 0.05 mg/kg IV/IO/IM; PR 0.5 mg/kg ages 2-5 and 0.3 mg/kg ages 6-11. - Lorazepam 0.1 mg/kg IV/IO/IM (max 4 mg), if seizure not terminated within 10 min, additional 0.05 mg/kg IV/IO/IM (max 4 mg).	No
Mississippi	Yes (NASEMSO model)	No divisions on protocol	- Midazolam 0.2 mg/kg IM preferred, or IN (max 10 mg); 0.1 mg/kg IV or IO, max 4mg Diazepam 0.1 mg/kg IV or IO, max 4mg; 0.2 mg/kg PR, max 10 mg Lorazepam 0.1 mg/kg IV or IO, max 4mg. *IN/IM preferred over PR/IV/IO routes. Consider consultation if not trained personnel or 2 doses of BZD administered.	No
	No	Any EMT	No	No
Missouri	(e.g. Kansas City)	Paramedic	-Midazolam 0.2 mg/kg IN (max 5mg), may repeat dose once; 0.1 mg/kg IV slow (max 5mg). Contact medical control for further additional doses.	No
	Yes	EMR, EMT, AEMT	No	No
Montana		AEMT with 199 Paramedic	- Midazolam 0.2 mg/kg (IV/IM/IN) (max 5 mg) Diazepam 0.3 mg/kg (IV/ET/IO/PR) (max 10 mg) Lorazepam 0.05 mg/kg (IV/IO/IM) (max 4 mg).	No
	Yes	EMR, EMT, AEMT	No	No
		EMT-I	-Diazepam 0.04 to 0.2 mg/kg (max) IV/IO/PR, may repeat to max 10 mg.	No
Nebraska		Paramedic	-Diazepam 0.04 to 0.2 mg/kg (max) IV/IO/PR, may repeat to max 10 mgLorazepam 0.05 mg/kg IV/IO/MAD, may repeatMidazolam 0.1 mg/kg IV/IO/IM/MAD, may repeat 0.1 mg/kg. * Maximum dose not exceed adult dose.	No
	No (e.g. Clark	EMT, AEMT	No	No
Nevada	County, including Las Vegas)	Paramedic	-Midazolam 0.1 mg/kg, IN/IM/IV/IO (max 5 mg)Diazepam 0.1 mg/kg IM/IV/IO/PR (max 5 mg)May repeat if status or recurrent seizures.	No

STATE	Statewide protocol available?	EMS type / technician level	BZD included in the protocol? Types, dosage and route of administration recommended? BZD re-dosing instructions or consultation call?	Non-BZD ASM included in the protocol?
	Yes	EMT, AEMT	No, only assist family if RM prescribed; if VNS, suggest the use of VNS magnet.	No
New Hampshire		Paramedic	- Midazolam 5 mg/ml concentration (IM/IN preferred if not IV), 0.2 mg/kg IM/IN (max 8 mg) repeat every 5 min; or 0.1 mg/kg IV (max 4 mg) repeat every 5 min. - Lorazepam 0.1 mg/kg IV (max 4 mg), repeat every 5 min. - Diazepam 0.1 mg/kg IV (max 10 mg) repeat every 5 min. * Diazepam and lorazepam are not well absorbed IM and should be given IV.	No
	Yes	BLS	No	No
New Jersey		ALS	- Diazepam 0.1 mg/kg IV (max 5 mg); may PR if not IV (same IV dose) Lorazepam 0.05 mg/kg IV (max 2 mg); 0.05 mg/kg (max 2 mg) through an approved route of administration Midazolam 0.15 mg/kg (max 5 mg) through an approved route of administration.	No
New Mexico	Yes	EMS first responder, EMT- basic, EMT- intermediate	No No	No
		Paramedic	- Midazolam 0.2 mg/kg IN/IM (max 5 mg), may repeat once after 10 min; 0.1 mg/kg IV slow/IO, repeat every 5 min as needed (max 10 mg) Diazepam 0.05–0.1 mg/kg IV/IO. * Buccal, IN, or IM routes are preferred as first line. PR not recommended.	No
	Yes	BLS, EMT, AEMT	No, may assist family with rectal diazepam.	No
New York		EMT-critical care	-Midazolam 0.1 mg/kg IM/IN (max 5 mg). Medical control for additional doses.	No
		Paramedic	-Midazolam 0.1 mg/kg IV/IM/IN (max 5 mg). Medical control for additional doses.	No
	Yes	EMR, EMT, AEMT	No	No
North Carolina		Paramedic	- Midazolam 0.1 – 0.2 mg/kg IV/IO/IM/IN, may repeat every 3 to 5 min (max 10 mg) Diazepam 0.1 – 0.3 mg/kg IV/IO/IM; 0.5 mg/kg PR; repeat 2 mg every 3 to 5 min (max 10 mg). *Do not delay IM with difficult IV/IO access. Notify destination or contact medical control.	No
	Yes	EMT, AEMT	No	No
North Dakota		Paramedic	- Midazolam IV/IO/IN, may repeat in 5 min Lorazepam IV/IO/IN, may repeat in 5-10 min Diazepam IV/IO, may repeat in 5-10 min. *Use weight/length-based system for pediatric patients.	No
	Yes	EMR, EMT	No No	No
		AEMT	- Diazepam 0.2 mg/kg, slow IV push over 3 min (max 5 mg); if no IV, 0.5 mg/kg PR (max 10 mg).	No
Ohio		Paramedic	- Midazolam 0.1 mg/kg IM Diazepam 0.2 mg/kg, slow IV push over 3 min (max 5 mg); if no IV, 0.5 mg/kg PR (max 10 mg).	No

STATE	Statewide protocol available?	EMS type / technician level	BZD included in the protocol? Types, dosage and route of administration recommended? BZD re-dosing instructions or consultation call?	Non-BZD ASM included in the protocol?
	Yes	EMR, EMT, EMT- 185, AEMT	No	No
Oklahoma		Paramedic	- Midazolam 0.1 mg/kg IM/IVP/IN/IOP (max 5 mg), may repeat once in 5 min Diazepam 0.1 mg/kg (max 5 mg) IVP/IOP/IM, may repeat once in 5 min Lorazepam 0.1 mg/kg (max 2 mg) IVP/IOP/IM, may repeat once in 10 min. *Midazolam preferred option.	No
	No (e.g.	EMR, EMT, AEMT, EMT-I	No	No
Oregon	Multnomah County, including Portland)	Paramedic	-Midazolam 0.3 mg/kg IM/IN (max 5 mg), may repeat every 3-5 min (max 10 mg). If still seizing, obtain IV/IO access, administer midazolam 0.1 mg/kg IV/IO every 3-5 min (max 15 mg IV/IO). If IV/IO is available, midazolam 0.1 mg/kg IV/IO (max 5 mg) every 3-5 min (max 25 mg IV/IO). * Total dose of midazolam, regardless of route (IM, IN, IV, IO) is 25 mg. If still seizing, contact medical control for possible midazolam drip.	No
	Yes	BLS	No	No
Pennsylvania		ALS	-Lorazepam 0.1 mg/kg IV/IO/IN (max 2 mg), may repeat every 5 min (max 4 mg)Diazepam 0.3 mg/kg IV/IO (max 5 mg); 0.5 mg/kg PR (max 10 mg); may repeat every 5 min (max 0.6 mg/kg)Midazolam 0.15 mg/kg IM; 0.1 mg/kg IV/IO/IN (max 2 mg); may repeat every 5 min (max 0.2 mg/kg IV). Titrate until seizure stops. Contact medical command.	No
	Yes	EMT	No, only assist family if RM prescribed; if VNS, suggest the use of VNS magnet.	No
		AEMT-Cardiac practitioner	- Midazolam 0.2 mg/kg IM/IN (max 4 mg); 0.1 mg/kg IV (max 4 mg); may repeat every 5 min (max of 1 mg/kg) Lorazepam 0.1 mg/kg IV (max 4 mg), may repeat every 5 min (max 0.5 mg/kg) Diazepam 0.1 mg/kg IV (max 5 mg); 0.5 mg/kg PR (max 20 mg); may repeat every 5 min (max 1 mg/kg).	No
Rhode Island		Paramedic	- Midazolam 0.2 mg/kg IM/IN (max 4 mg); 0.1 mg/kg IV (max 4 mg); may repeat every 5 min (max of 1 mg/kg). - Lorazepam 0.1 mg/kg IV (max 4 mg), may repeat every 5 min (max 0.5 mg/kg). - Diazepam 0.1 mg/kg IV (max 5 mg); 0.5 mg/kg PR (max 20 mg); may repeat every 5 min (max 1 mg/kg). *IM/IN route preferred if no immediate IV access. *Lorazepam first option if IV/IO access. *Diazepam least desirable choice.	YES -Phenobarbital 20 mg/kg IV, rate < 50 mg/min, may repeat 5 mg/kg IV every 5 min until seizure activity is terminated. -Levetiracetam 20 mg/kg IV over 15 min, may repeat once.

STATE	Statewide protocol available?	EMS type / technician level	BZD included in the protocol? Types, dosage and route of administration recommended? BZD re-dosing instructions or consultation call?	Non-BZD ASM included in the protocol?
	Yes	EMR, EMT, AEMT	No	No
South Carolina		Paramedic	-Benzodiazepines, may repeat once after 5 min. Local medical control will assign dosage, route, etc. * Addressing the ABCs and verifying blood glucose is more important than stopping the seizure. Rectal diazepam/lorazepam: Draw drug dose up in a 3 ml syringe. Remove needle and attached syringe to an IV extension tube. Insert tube in rectum and inject drug. Flush with 3 ml of air and remove. Contact medical control if still seizing.	No
South Dakota	Not available (Minnehaha County, including Sioux Falls, not available; Hughes County, containing Pierre, not available)			
Tennessee	Yes	EMR, EMT, AEMT Paramedic	No -Diazepam 0.1 mg/kg IV/IOMidazolam 0.1 mg/kg IV/IO; 0.2 mg/kg IM (max 6 mg), may repeat once after 10 minutes, contact medical control if seizure activity persists after repeat dose; 0.3 mg/kg IN (max 10 mg), max total 0.4 mg/kgLorazepam 0.1 mg/kg IV/IO (max 4 mg), may repeat in 5 min; not to exceed 0.2 mg/kg total (max 8 mg). * If seizure persists for 4 min repeat medication once.	No No
Texas	No (e.g. city of Houston)	BLS ALS	No -Midazolam IN/IM per pediatric dosing. If seizure continues > 5 min after initial dose, midazolam IN/IM/IV/IO per pediatric dosing. Further orders as per on-line physician. Dosing: 0.1 mg/kg IV/IO and 0.2 mg/kg IN/IM; careful titration for repeat dosages, not exceeding 2 mg per dose; maximum cumulative dose of 4 mg without on-line physician approval. * Midazolam should be given IM (or IN in pediatric patients) prior to an IV attempt. Midazolam shall only be given initially IV or IO if the patient has a pre-existing IV or IO immediately available.	No No

STATE	Statewide protocol available?	EMS type / technician level	BZD included in the protocol? Types, dosage and route of administration recommended? BZD re-dosing instructions or consultation call?	Non-BZD ASM included in the protocol?
	Yes	EMT	No	No
Utah		AEMT, paramedic	-Midazolam 0.3 mg/kg IN (max 5 mg), may repeat once in 5 min (max 10 mg); 0.15 mg/kg IM (max 5 mg), may repeat once in 10 min (max 10 mg); 0.1 mg/kg IV/IO (max 5 mg), may repeat once in 5 min (max 10 mg). -Diazepam 0.1 mg/kg (max 5 mg) IV/IO, may repeat every 5 min (max10 mg); 0.2 mg/kg IM (max 10 mg), may repeat every 10 min (max 20 mg) (IM not preferred unless no other options). -Lorazepam 0.1 mg/kg IV/IO/IM (max 2 mg), may repeat every 5 min (max 4 mg). Contact medical control for dosages above those provided or use of medication not fitting the guideline parameters.	No
	Yes	EMT, AEMT	No, only assist family if RM prescribed (diazepam rectal gel, intranasal midazolam; if VNS, suggest the use of VNS magnet.	No
Vermont		Paramedic	-Midazolam 0.2 mg/kg IM (preferred) or IN (max 10 mg, and 5mg/ml concentration recommended for IM/IN administration); 0.1 mg/kg IV (max 4 mg)Lorazepam 0.1 mg/kg IV (max 4 mg)Diazepam 0.1 mg/kg IV (max 10 mg). Any of the above may be repeated once after 5 min. Contact medical direction for additional dosing. Preferred initial dose is midazolam IM/IN. If IV established, administer IV.	No
	No (e.g.	EMT, AEMT	No	No
Virginia	Tidewater EMS regional council, including Virginia Beach)	Intermediate Paramedic	-Midazolam 0.2 mg/kg IN equally divided in each nostril (max 5 mg) (midazolam IN preferred drug); 0.1 mg/kg slow IV/IM push over 1 min (max 2.5 mg) (IM if not IV access, may be just as good, if not better, than lorazepam IV) (midazolam IV/IM as 2nd option after midazolam IN)Lorazepam 0.1 mg/kg IV/IO (max 2 mg), slow IV push, over 2 min (may be administered IM if no IV/IO access). May repeat with physician order (max 8 mg). *IO placement is the last resort.	No
	No (King	BLS	No	No
Washington	County, including Seattle, not available; e.g.Thurston County, including Olympia)	ALS	-Midazolam 0.1 mg/kg IV, may repeat q 3 min (max 5 mg); 0.2 mg/kg IM/IN, may repeat q 3 min (max 10 mg).	
	Yes	BLS	No	No
West Virginia		Paramedic Advanced Care Technician	If patient has prescription of rectal diazepam, administer it and contact medical commandMidazolam IV/IO/IM 0.1 mg/kg (max 5 mg); if no IV, 0.2 mg/kg IN via atomizer (max 5 mg). The administration requires medical control physician order. Further treatment as ordered by medical command.	No

STATE	Statewide protocol available?	EMS type / technician level	BZD included in the protocol? Types, dosage and route of administration recommended? BZD re-dosing instructions or consultation call?	Non-BZD ASM included in the protocol?
Wisconsin	Yes	EMR, EMT, AEMT Intermediate	No -Midazolam 0.1-0.2 mg/kg IN/IM (max 10 mg) (should be 5mg/ml concentration), may repeat in 5 min; 0.1-0.2 mg/kg IV (max 10 mg), may repeat in 5 minDiazepam rectal 0.5 mg/kg <6 y/o, 0.3 mg/kg 6-11 y/o, 0.2 mg/kg > 11y/o, may repeat in 10 min, for continued seizure 0.2 mg/kg/doseLorazepam 0.05-0.1 mg/kg/dose (max 2 mg). If no IV/IO access, administer midazolam IN/IM or rectal diazepam. Intermediate agencies may have only one benzodiazepine on formulary.	No No
		Paramedic	Same than intermediate level plus alternative benzodiazepines. Contact medical control for persistent seizures.	No
Wyoming	No (Laramie County, including Cheyenne, not available)			No

Legend: BLS: Basic Life Support providers, ALS: Advanced Life Support providers, EMT: Emergency Medical Technician, AEMT: Advanced Emergency Medical Technician, EMT-I: Intermediate, EMR: Emergency Medical Responder, IM: intramuscular, IV: intravenous, IN: intranasal, IO: intraosseous, PR: per rectum, MAD: mucosal atomization device, RM: rescue medication, NASEMSO: National Association of State EMS Officials, BZD: benzodiazepines, ASM: anti-seizure medication, VNS: vagus nerve stimulation, ET: endotracheal.

LINKS TO THE PROTOCOLS:

ALABAMA: http://www.alabamapublichealth.gov/ems/assets/9thEditionProtocolsFinal.pdf

ALASKA: https://nasemso.org/wp-content/uploads/National-Model-EMS-Clinical-Guidelines-2017-PDF-Version-2.2.pdf

 $ARIZONA: \underline{https://www.azdhs.gov/preparedness/emergency-medical-services-trauma-system/index.php\#community-paramedicine-home}$

ARKANSAS: https://www.healthy.arkansas.gov/images/uploads/pdf/EMS_National_Guidelines_2017.pdf

CALIFORNIA: Los Angeles County http://file.lacounty.gov/SDSInter/dhs/1040482 1231-PSeizure2018-04-29.pdf

COLORADO: Denver metropolitan area http://www.dmemsmd.org/sites/default/files/DMEMSMD-Protocols-2019-7-Linked.pdf

CONNECTICUT: https://portal.ct.gov/-/media/Departments-and-

 $\underline{Agencies/DPH/dph/ems/pdf/statewide\ protocols/V20191ProtocolsFINALNOSEC2EpiAdd.pdf?la=en}$

DELAWARE: https://statefireschool.delaware.gov/wp-content/uploads/sites/114/2018/10/2018-BLS-Standing-Orders.pdf and

https://www.dhss.delaware.gov/dph/ems/files/paramedicstandingorders2018.pdf

DISTRICT OF COLUMBIA: https://fems.dc.gov/sites/default/files/dc/sites/fems/publication/attachments/DC%20FEMS%202017%20Protocol%20Update%20-

%20April%201%2C%202019%20Part%201.pdf

FLORIDA: Miami-Dade County https://mdsceh.miamidade.gov/mobi/moms/protocol%2016p.pdf

GEORGIA: Not available.

HAWAII: https://health.hawaii.gov/ems/files/2018/09/SO2018.pdf

IDAHO: http://healthandwelfare.idaho.gov/Portals/0/Medical/EMS/EMSPC/EMSPCProtocols2017ProceduresFINAL.pdf

ILLINOIS: Chicago, paramedics https://chicagoems.org/wp-content/uploads/2019/01/ALS-SMO-MDC APPROVED.pdf; BLS https://chicagoems.pdf; BLS https://chicagoems.pdf; BLS https://chicagoems.pdf; BLS https://chic

content/uploads/2019/01/BLS-SMO-MDC APPROVED.pdf

INDIANA: Indianapolis http://protocols.indianapolisems.org/medical.html#parentVerticalTab11

IOWA: https://idph.iowa.gov/Portals/1/userfiles/179/2018%20Protocols%20FINAL-TOC%20update.pdf

KANSAS: http://www.ksbems.org/ems/?page id=468

KENTUCKY: https://kbems.kctcs.edu/media/medical-direction/Kentucky%20State%20Protocols%20COMPLETE%204.18%20UPDATE.PDF

LOUISIANA: New Orleans https://www.nola.gov/ems/documents/rope-march-2018/

MAINE: https://www.maine.gov/ems/documents/2018 Protocol.pdf

MARYLAND: http://www.miemss.org/home/Portals/0/Docs/Guidelines-Protocols/MD-Medical-Protocols-2019.pdf?ver=2019-04-18-095706-647

MASSACHUSETTS: https://www.mass.gov/files/documents/2019/08/06/emergency-medical-services-pre-hospital-treatment-protocols-version-2019-2-

effective-100119.pdf

MICHIGAN: https://www.michigan.gov/documents/mdhhs/Section 4 Obstetrics and Pediatrics 613176 7.pdf

MINNESOTA: BLS https://mn.gov/emsrb/assets/2013BLSPedsguidelines_tcm1116-366187.pdf; ALS

https://mn.gov/emsrb/assets/2013ALSPedsguidelines_tcm1116-366186.pdf

MISSISSIPPI: https://msdh.ms.gov/msdhsite/static/47,19055,305,382.html

MISSOURI: Kansas City https://www.kcmo.gov/home/showdocument?id=3348

NEBRASKA: http://dhhs.ne.gov/OEHS%20Program%20Documents/EMS%20Model%20Protocols.pdf

NEVADA: Clark County, Las Vegas http://media.southernnevadahealthdistrict.org/download/ems/2019/20190701-July-One-Protocol.pdf

NEW HAMPSHIRE: https://www.nh.gov/safety/divisions/fstems/ems/advlifesup/documents/patientprotocols7.1.pdf

NEW JERSEY: https://njems.njlincs.net/cdr/docs/NJEMS FieldGuide PDF.pdf

NEW MEXICO: https://nmhealth.org/publication/view/policy/1892/

NEW YORK: BLS https://www.health.ny.gov/professionals/ems/docs/bls_protocols.pdf; ALS

https://www.health.ny.gov/professionals/ems/docs/collaborative_protocols.pdf

NORTH CAROLINA: https://www.ncems.org/protocols/allprotocols.pdf

NORTH DAKOTA: https://www.health.nd.gov/epr/emergency-medical-systems/emergency-medical-services-system/ems-protocols/

OHIO: https://www.ems.ohio.gov/links/ems Pediatric-Guidelines-Procedures-Manual.pdf

OKLAHOMA: https://www.ok.gov/health2/documents/2018%20State%20Protocols%20with%20references%204-18-2018.pdf

OREGON: Multnomah County, including Portland https://multco.us/health/providers/emts-paramedics

PENNSYLVANIA: ALS https://www.health.pa.gov/topics/Documents/EMS/2019%20PA%20ALS%20Protocols%20Final.pdf, BLS

 $\underline{https://www.health.pa.gov/topics/Documents/EMS/2019\%20PA\%20BLS\%20Protocols\%20Final.pdf}$

RHODE ISLAND: http://www.health.ri.gov/publications/protocols/StatewideEmergencyMedicalServices.pdf

SOUTH CAROLINA: https://www.scemsportal.org/sites/default/files/2017%20State%20Protocols%20and%20Formulary%209-12-2019.pdf

SOUTH DAKOTA: Not available.

TENNESSEE: https://www.tn.gov/content/dam/tn/health/events/7.7.18PDF%20TN%20EMS%20Protocol%20Guidelines%20-%20Mar2018%20(Rev7.7.18).pdf

TEXAS: City of Houston https://www.hfdmd.org/HFDProtocols2019.pdf

UTAH: https://bemsp.utah.gov/bemsp/wp-content/uploads/sites/34/2018/07/2017 utah ems medical guidelines-4.pdf

VERMONT: http://www.healthvermont.gov/sites/default/files/DEPRIP.Protocols%202018%20FINAL%20June%208.pdf

VIRGINIA: Virginia Beach, part of Tidewater EMS regional council

 $\underline{http://tidewaterems.org/update/2017\%2010\%2002\%20Tidewater\%20EMS\%20Regional\%20Medical\%20Protocols\%20with\%20Appendixes.pdf}$

WASHINGTON: King County, including Seattle, not available. Thurston County, including Olympia

 $\underline{https://www.thurstoncountywa.gov/m1/m1documents/Thurston\%20County\%20EMS\%20Field\%20Protocols.pdf}$

WEST VIRGINIA: BLS https://www.wvoems.org/media/371134/combined%20emt%20protocols.pdf, paramedic

https://www.wvoems.org/media/371130/combined%20paramedic%20protocols.pdf, ACT

 $\underline{https://www.wvoems.org/media/371138/combined\%20act\%20protocols.pdf}$

WISCONSIN: https://www.dhs.wisconsin.gov/ems/treatment.htm

WYOMING: Not available.