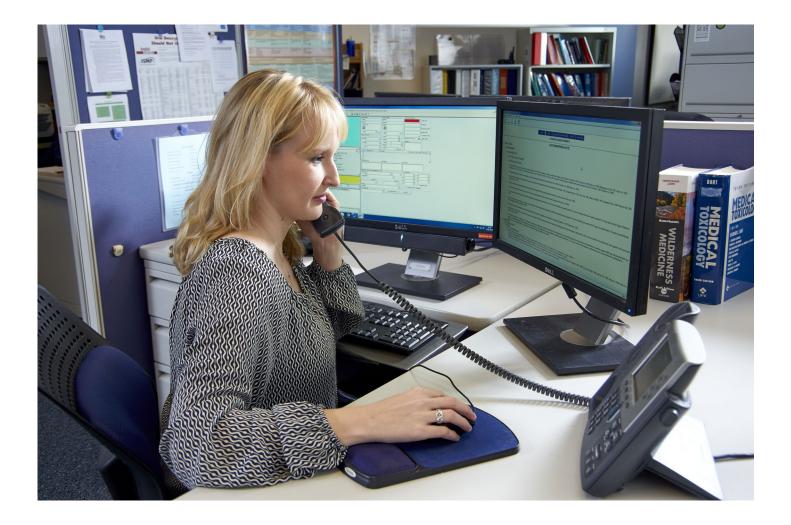
# 2022 Annual Report





West Virginia University. HEALTH SCIENCES CHARLESTON CAMPUS

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### West Virginia Poison Center

West Virginia University Robert C. Byrd Health Sciences Center Charleston Campus

### Poison Emergencies-1-800-222-1222

Administration-(304) 347-1212

Community Outreach-(304) 347-1379

### Website: www.wvpoisoncenter.org

## West Virginia Poison Center

### **History**

- Established in 1979 by then WV Governor, U.S. Senator Jay Rockefeller
- Recognized by the State of West Virginia as West Virginia's only poison center-April 1986
- 1st certification as a Regional Poison Center by the American Association of Poison Control Centers-September 1986
- Re-certification granted: 1992, 1997, 2002, 2007, 2012, 2017
- Moved from borrowed space to the Robert C. Byrd Health Sciences Center, West Virginia University Charleston Campus-1993
- Established in WV Code <u>W. Va. Code §18B-11B-1 et seq.</u> (<u>HB</u> <u>4651</u>)-2006

## **Mission Statement**

The West Virginia Poison Center is an information resource for both the public and health care professionals, whose twofold purpose is to assist in the provision of optimal treatment of the poisoned patient and to reduce the number of accidental poisonings throughout all fifty-five counties of West Virginia.

## **Those served by the WVPC**

- All 55 counties in West Virginia
- . General public
- Health care professionals
- All ages (infant, children, adolescents, adults, senior citizens)
- All socioeconomic classes
- All facilities (e.g., home, hospitals, schools, businesses, industry)

## Calls Managed By the Poison Center

Accidental poisonings in children & adults

Medications, plants, mushrooms, household cleaners, etc.

- Misuse of drugs or chemicals
- Drug interactions/adverse drug, chemical, food reactions
- Self harm/suicide attempts
- Overdoses (opioids (e.g., oxycodone, heroin, fentanyl), novel synthetic drugs of abuse, cocaine, methamphetamine, others)
- Spider, snake, and insect bites
- Hazardous material exposures (e.g., chemical spills, terrorism agents)
- Occupational, short term exposures to chemicals
- Chronic lead poisoning
- Triage of pet poisonings

### When is the WVPC available?

- 24 hours a day (toll free number, and TTY accessible)
- 365 days a year

### Qualifications of Staff Answering Poison Center Calls

Medical experts (doctors, pharmacists, and nurses) with specialized training in the recognition and management of poisonings/overdoses from drugs, toxins, venoms, chemicals, plants/mushrooms, radiation, and other substances



Certified Specialists in Poison Information (CSPIs), have extensive experience and training in the area of toxicology and must pass a national poison specialist examination. Maintenance of certification requires reexamination and proof of continued fulltime employment as a CSPI.

### What types of resources are used?

- Trained and experienced medical experts
- Computer based databases for product based information
- On-line databases for specific toxin types
- An up-to-date comprehensive toxicology library (print and on-line)
- Multiple toxicology text books (updated yearly)
- Specialty consultants
- Internet based resources
- Safety Data Sheets (SDS's)

## **Poison Center Staff**

Clinical/Executive Director: Elizabeth J. Scharman, Pharm.D., DABAT\*, BCPS\*\*, FAACT` Professor, WVU School of Pharmacy, Department of Clinical Pharmacy Medical Director: Michael G. Abesamis, M.D., ABEM-MT^ Back-up Medical Directors: Anthony F. Pizon, M.D., ABEM-MT^, FACMT+ Michael J. Lynch, M.D., ABEM-MT^ Joshua A. Shulman, M.D., ABEM-MT^ Supervisor of Operations: Jamie R. Nisbet, RN, MSN, CSPI#, AHLS## Logistics Supervisor: Ryan S. Aliff, RN, BSN, CSPI#, AHLS## Certified Specialists in Poison Information: Sue A. Acord, RN, BSN, CSPI# **Donna Fink,** RN, BSN, CSPI# **Richard Gray,** RN, BSN, CSPI# Kenneth G. Haught, RN, BSN, CSPI# (through July 2022) Rebecca King, RN, MSN, MEd, CSPI# Specialists in Poison Information: Melissa Lilly, RN, BSN, SPI#\* (since July 2022) Community Outreach Coordinator: Carissa E. B. McBurney, MPA Business Office: Debra Kohler, MBA

\*Diplomate: American Board of Applied Toxicology \*\*Board Certified Pharmacotherapy Specialist

`Fellow, American Academy of Clinical Toxicology

^American Board Emergency Medicine /Sub-board: Medical Toxicology +Fellow, American College of Toxicology

#Certified Specialist in Poison Information ##Advanced Hazmat Life Support #\* Specialist in Poison Information

## Poison Center Staff (cont.'d)



**Dr. Elizabeth Scharman**, Pharm.D., DABAT, BCPS, FAACT; Clinical/Executive Director



Jamie Nisbet, RN, MSN, CSPI, AHLS;

Supervisor of Operations



**Carissa McBurney**, MPA; Community Outreach Coordinator



**Dr. Mike Abesamis**, M.D., ABEM and Medical Toxicologist; Lead Medical Director



Ryan Aliff, RN, BSN, CSPI, AHLS; Logistics Supervisor



Debra Kohler, MBA; Business Office

# Poison Center Director & Medical Directors

The WVPC Clinical and Medical Directors are the only board certified clinical and medical toxicologists in West Virginia. The Lead Medical Director and back-up medical directors are also board certified in emergency medicine. The clinical and medical directors are responsible for ensuring that:

- There is 24 hour a day availability of clinical and medical toxicology consultative services for health care professionals and WVPC Poison Specialists.
- All recommendations provided by the WVPC are based on the best, current, evidence-based practice

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• Health care professional education in clinical/ medical toxicology in WV is provided.

### **Health Professional Education**

Supervised experience in the WV Poison Center: Pharmacy students (15 weeks total)

Number of professional presentations	8
Hours of didactic instruction for WVU School of Medicine	5
Hours of didactic/laboratory instruction WVU School of Pharmacy	32
Hours of didactic instruction for other institutions	3



## **Poison Center**

## **Committee Representation**

### Director

American Association of Poison Control Centers (AAPCC) Chair, AAPCC Quality & Coding Committee Co-Chair, AAPCC Benchmarking Committee Member, Rapid-Response Coding Team Member, Fatality Review Committee Chair, AAPCC/IBM Coding Task Force Member, North American Congress of Clinical Toxicology Abstract Review Committee West Virginia University School of Pharmacy Academic and Professional Integrity Committee West Virginia Bureau for Public Health Deputy Strategic National Stockpile/Medical Counter Measures Coordinator Office of Drug Control Policy; Naloxone Distribution Workgroup State Epidemiological Outcomes Workgroup Emergency Medical Services for Children Advisory Panel, Ad hoc Member Toxicology and Poison Control Editorial Panel, Annals of Pharmacotherapy, Chairman Editorial Review Panel, Clinical Toxicology, Member

### **Community Outreach Coordinator**

#### American Association of Poison Control Centers (AAPCC)

Member, Public Education Committee (PEC) Steering Committee Member, Public Education Committee (PEC) Membership Subcommittee Member, Public Education Committee (PEC) National Congress of Clinical Toxicology (NACCT) Planning Subcommittee Chair, Public Education Committee (PEC) National Poison Prevention Week (NPPW) Subcommittee

## **Poison Center Advisory Board**

Associate Vice President and Dean, West Virginia University Health Science Center, Charleston Division: John C. Linton, Ph.D., ABPP; Chair

Ex-officio: Elizabeth J. Scharman, Pharm.D., DABAT; Clinical/Executive Director, WV Poison Center

**Cabinet Secretary, West Virginia Department of Homeland Security:** Jeff S. Sandy, CFE, CAMS Designee: GE McCabe, Director of West Virginia Division of Emergency Management

**Chancellor, West Virginia Higher Education Policy Commission:** Dr. Sarah Armstrong Tucker Designee: Dr. Cynthia Persily, RN, Ph.D., Vice Chancellor for Health Sciences

Commissioner, West Virginia Bureau for Public Health: Ayne Amjad, M.D., MPH (through September 2022) Ex-officio: Timothy Priddy, Director of West Virginia Center for Threat Preparedness

President and CEO, West Virginia Hospital Association: Jim Kaufman, Ph.D.

Public Health Education/Research/Administration: Letitia Tierney, M.D., Esq.

Sherri P. Ferrell, MBA, President and CEO,

WV Primary Care Association

Debra Boyd, COO/CF0

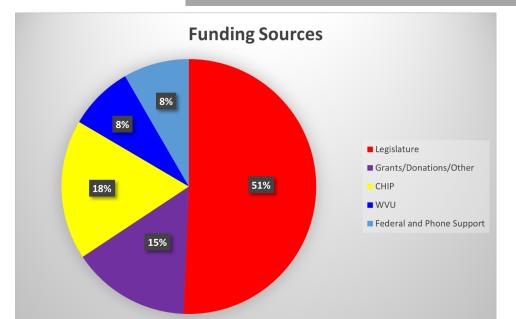
WV Primary Care Association

General Public Representative, Seniors: Jack A. Rogers, Esq.

Board President, Kanawha Valley Senior Services

#### Poison Center Funding & Expenses-July 1, 2022 to June 20, 2023

### **Funding Sources—Direct Costs**



WVU Health Sciences Center covers indirect expenses (e.g., rent, WVU administration expenses, insurance) valued at \$115,320.00.

#### Dollars Saved in West Virginia = approximately \$30 million

WV Poison Center helps decrease:

- Emergency department and hospital expenses
- Use of ambulance services
- Antidote costs

Revenue for Direct Costs (State FY '22-'23):

- WV Legislature: \$712,942
- Federal Grant and Phone Support: \$115,747
- CHIP: \$225,000
- Grants/donations/other: \$211,540

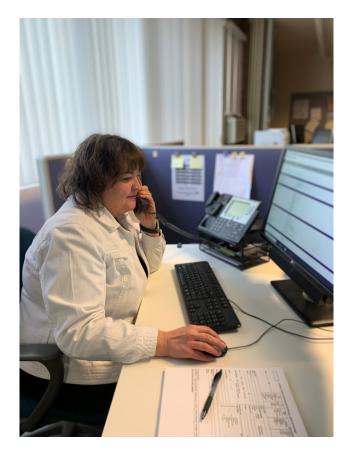
\*While the WVPC also ran the WV Coronavirus Hotline in 2022, separate funds were used for that purpose

#### **Program Expenses—Direct Costs**

Salaries	77%
Capitol Equipment, Information Technology Support, Maintenance	9.5%
Software & Databases	8%
Emergency Telephone Lines/ Telecommunications	3%
Educational Materials & Office Supplies	2%
Travel (to provide programs, to meetings)	1.0%
Misc.	0.5%

# Use of Data Collected by the Poison Center

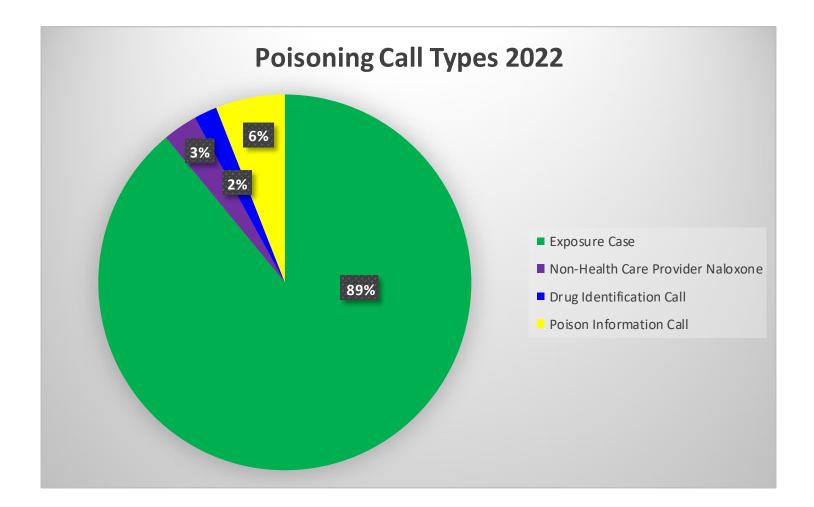
The WVPC participates in the American Association of Poison Control Center's National Poison Data System (NPDS), the largest poison exposure database in the United States.



De-identified data collected is used to:

- Target problem areas and adjust services
- Advance knowledge of poisons and antidotes
- Teach health care professionals and students
- Provide necessary data for product safety regulation

## **Types of Calls Received**



Total Exposure Cases: 15,526

Total Information Calls: 1,087

Follow-up Calls: 22,716

## **Top 10 Substance Exposures**

	Top 10 Substances All Ages Combined	#
1	Analgesics (for pain or fever, includes acetaminophen, ibuprofen, opioids and others)	2,304
2	Cleaning Substances (Household)	1,369
3	Antidepressants	1,080
4	Cardiovascular Drugs	1,016
5	Cosmetics/Personal Care Products	897
6	Antihistamines	855
7	Pesticides	834
8	Sedatives/Hypnotics/Antipsychotics	791
9	Foreign Bodies/Toys/Miscellaneous	728
10	Dietary Supplements/Herbals/Homeopathics	687

## **Top 10 Drug Exposures**

	Top 10 Drug Categories All Ages Combined	#
1	<b>Analgesics</b> (for pain or fever, includes acetaminophen, ibuprofen, opioids and others)	2,304
2	Antidepressants	1,080
3	Cardiovascular Drugs	1,016
4	Antihistamines	855
5	Sedative/Hypnotics/Antipsychotics	791
6	Dietary Supplements/Herbals/Homeopathics	687
7	Stimulants and Street Drugs (Prescription (e.g., ADHD medication) and illicit drugs; includes methamphetamine, cocaine, novel synthetics)	511
8	Hormones and Hormone Antagonists	495
9	Anticonvulsants	448
10	Vitamins	425

	Top 10 Prescription/Non-Prescription Drugs All Ages Combined	#
1	Acetaminophen (as only drug in product)	533
2	Ibuprofen	489
3	Melatonin	457
4	Benzodiazepines	299
5	Atypical Antipsychotics	297
6	Diphenhydramine	260
7	Beta blockers (as only drug in product)	236
8	Antibiotics (oral)	199
9	Hydroxyzine	179
10	Sertraline	179

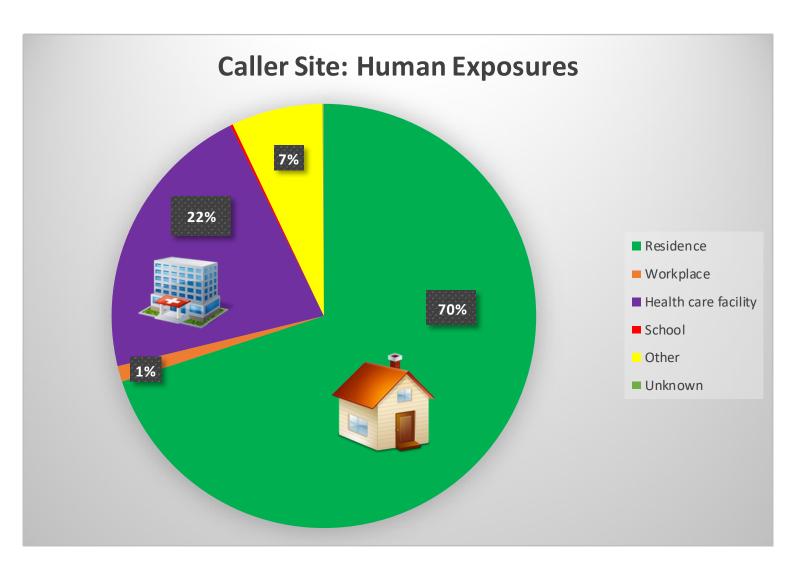
## Human Exposures By County

	Colum		Colu		Colu	PENETRANCE (Calls /
COUNTY	<b>n1</b>	POPULATION	mn2	EXPOSURES	mn6	1,000 Population)
Barbour		16,441		99		6.03
Berkeley		119,171		770		6.47
Boone		21,457		137		6.39
Braxton		13,957		88		6.31
Brooke		21,939		33		1.51
Cabell		91,945		915		9.96
Calhoun		7,109		47		6.62
Clay		8,508		47		5.53
Doddridge		8,448		25		2.96
Fayette		42,406		301		7.10
Gilmer		7,823		24		3.07
Grant		11,568		75		6.49
Greenbrier		34,662		377		10.88
Hampshire		23,175		96		4.15
Hancock		28,810		72		2.50
Hardy		13,776		52		3.78
Harrison		67,256		517		7.69
Jackson		28,576		195		6.83
Jefferson		57,146		265		4.64
Kanawha		178,124		1,621		9.11
Lewis		15,907		118		7.42
Lincoln		20,409		86		4.22
Logan		32,019		244		7.63
Marion		56,072		323		5.77
Marshall		30,531		169		5.54
Mason		26,516		161		6.08
McDowell		17,624		113		6.42

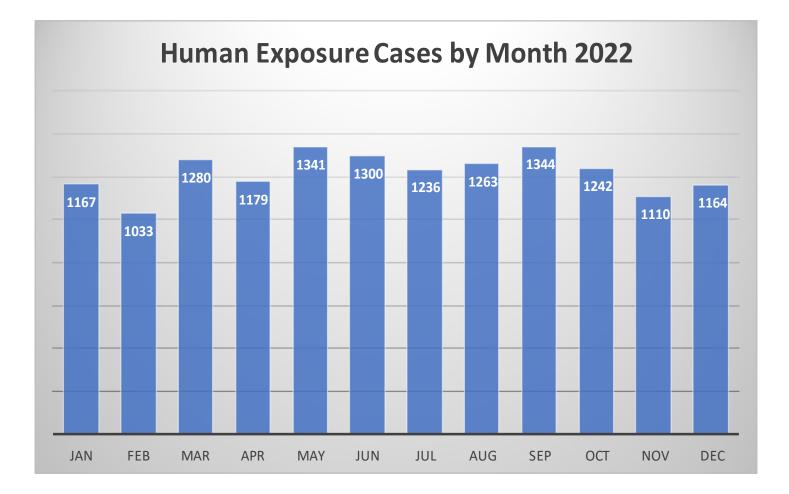
## Human Exposures By County (cont.'d)

COUNTY	POPULATION	EXPOSURES	PENETRANCE (Calls / 1,000 Population)
Mercer	58,758	440	7.49
Mineral	26,868	116	4.32
Mingo	23,424	125	5.34
Monongalia	105,612	759	7.19
Monroe	13,275	60	4.52
Morgan	17,884	118	6.60
Nicholas	24,496	152	6.21
Ohio	41,411	205	4.96
Pendleton	6,969	33	4.74
Pleasants	7,460	29	3.89
Pocahontas	8,247	40	4.86
Preston	33,432	137	4.10
Putnam	56,450	335	5.94
Raleigh	73,361	671	9.15
Randolph	28,695	194	6.77
Ritchie	9,554	36	3.77
Roane	13,688	91	6.65
Summers	12,573	49	3.90
Taylor	16,695	64	3.84
Tucker	6,839	19	2.78
Tyler	8,591	50	5.83
Upshur	24,176	182	7.53
Wayne	39,402	225	5.72
Webster	8,114	42	5.18
Wetzel	15,065	59	3.92
Wirt	5,821	28	4.82
Wood	83,518	595	7.13
Wyoming	20,394	127	6.23
Unknown	N/A	414	
Not specified or out of state cell phone	N/A	2,292	
2021 TOTALS	1,792,147	14,657	8.18

## **Caller Site**



## **Cases by Month**



The West Virginia Poison Center not only looks at poisoning trends, but also looks at seasonal exposure trends. Identifying these trends help with the development of community outreach programming and education throughout the state.

## West Virginia Schools

The WVPC works closely with schools and school nurses in West Virginia and consults with the West Virginia Office of Student Support & Wellbeing, School Health.

The West Virginia Department of Education requires that the West Virginia Poison Center be contacted for the following:

-adverse drug reactions

-therapeutic errors

-drugs or medication overdoses

-epinephrine injections

-naloxone administration

#### WVPC School Service 2022:

All of West Virginia's public schools received information from the WVPC

Over 20,000 WVPC items were used by WV schools

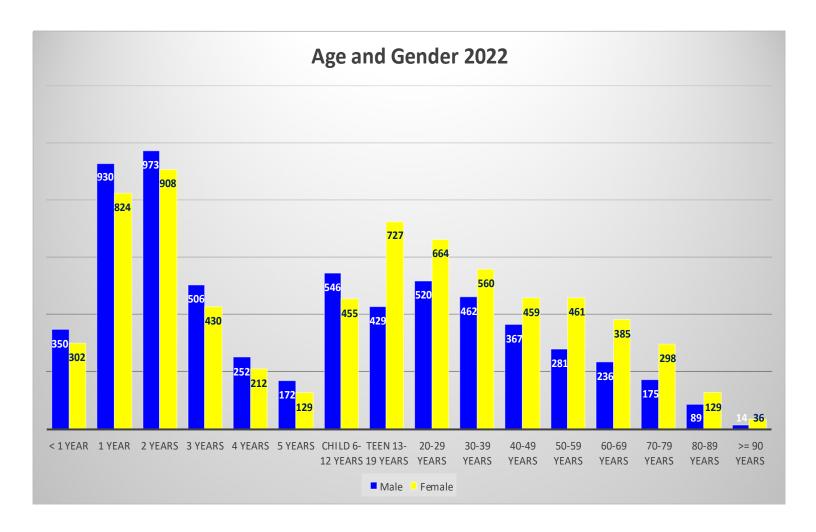
WV Schools participated in a WVPC Fall Poster Contest-

126 posters were submitted

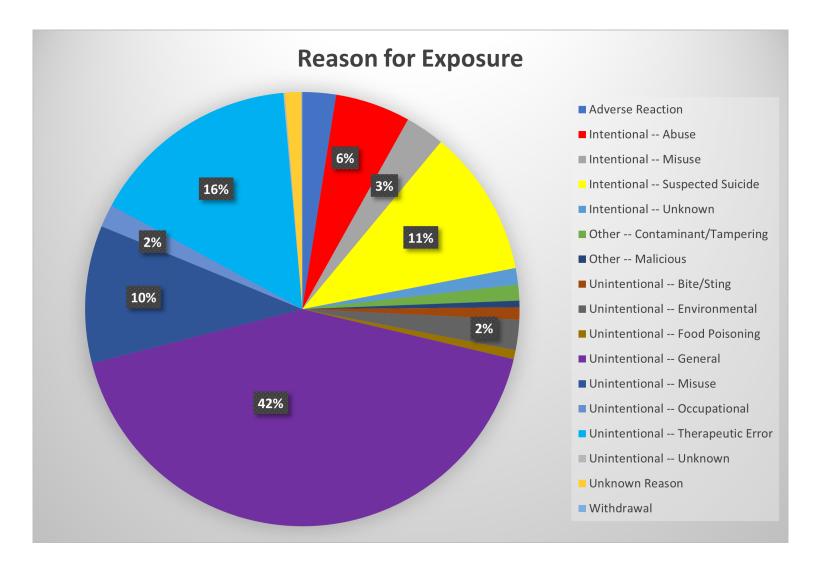
from schools across the state



## **Age & Gender Distribution**



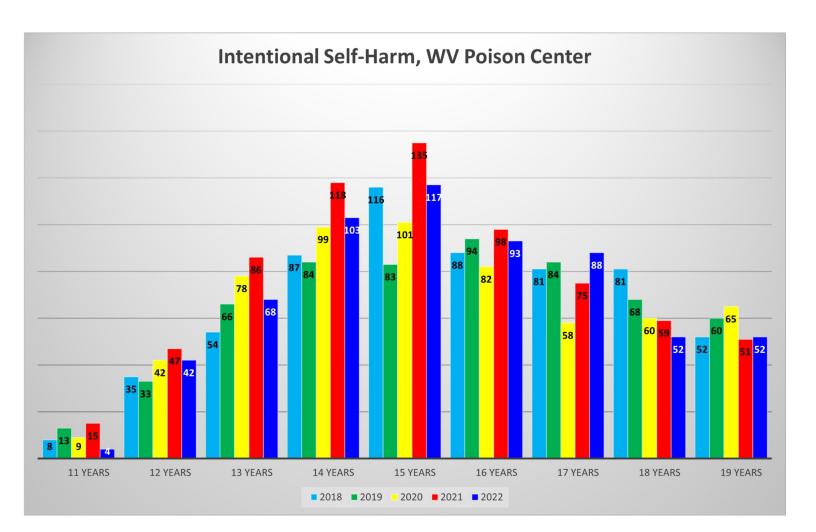
# Poisonings/Overdoses Happen for Many Reasons



Adverse reactions include: reactions to food, drug, or other (e.g., allergies, adverse effects from therapeutic use of drugs)

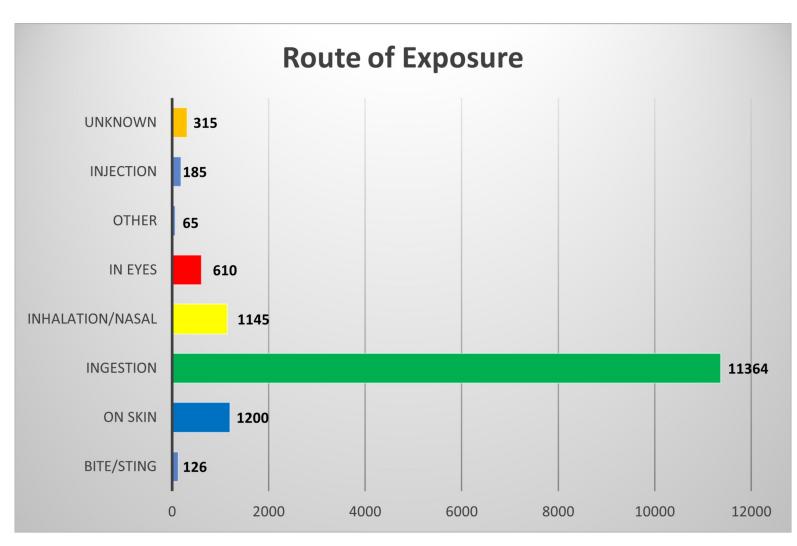
Intentional exposures include: self harm/suicide, drug abuse, intentional misuse Other exposures include: effects from contamination, adulteration, malicious intent Unintentional exposures include: accidental, environmental, unintentional misuse, occupational

### **Intentional Self-Harm Exposures in Adolescents**



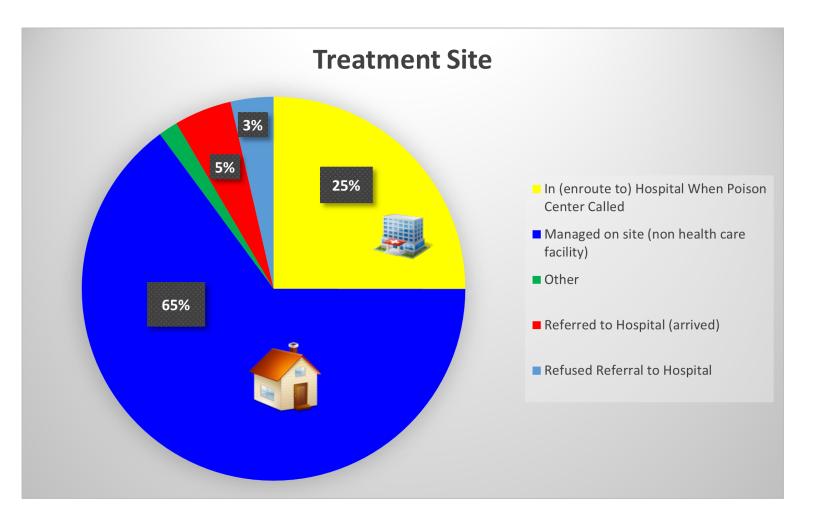
Intentional self-harm increased in 2022 for 17 year olds and stayed the same for 19 year olds. Intentional self-harm was also higher in 2022 than the pandemic lock-down year of 2020 for: 14 year olds, 15 year olds, 16 year olds, and 17 years olds.

## **Route of Exposure**



Ingestion was the route for 76% of calls.

## **Treatment Site**



The majority of poisonings can be managed at home, especially for those less than 12 years of age. Unless the person is unconscious, not breathing, or having a seizure, call the Poison Center first.

# Member Treatment Hospital (MTH) Program

The West Virginia Poison Center's (WVPC) Member Treatment Hospital (MTH) Program is designed to extend the services of the WVPC into local communities throughout West Virginia. The WVPC provides Member Hospitals with:

- 1) Current information for poisoned patient management, and
- 2) Tools to educate local communities about the Poison Center and poison prevention. This cooperative effort is mutually beneficial to the patient, community, and the WVPC.

The goal of the MTH program is to provide the most current and accurate poisoning management information to all hospitals in West Virginia in the most efficient manner possible. With the MTH program, hospitals in West Virginia pay a yearly fee to the WVPC in exchange for:

- 1) Supplies of education materials and Mr. Yuk stickers free of charge;
- 2) Customized Toxic Substance Reviews;
- 3) WVPC attendance at health fairs;
- 4) WVPC participation at a hospital in-services upon request;
- 5) Availability of a free toxicology continuing education program for nurses, pharmacists, physicians
- 6) 24 hour availability of the WVPC's medical director; and
- 7) Recognition as a contributor to the WVPC on the website with hospital links and in the annual report.

Toxic Substance Reviews (TSR's), written by the WVPC staff, provide hard copy information about toxic substances. These reviews are transmitted upon request to the treating physician via facsimile (fax). This hard copy information is intended to supplement verbal information given by the Specialist in Poison Information. The WVPC remains in close contact with the hospital to follow the patient's progress and to provide further assistance as needed.

Hospitals that choose not to participate in the MTH program are charged on a per call basis to cover the costs associated with providing written information.

## Member Treatment Hospital (MTH) Program Participants

Appalachian Regional Healthcare		St. Mary's Medical Center	Huntington
Beckley	Beckley	Plateau Medical Center	Oak Hill
Summers County	Hinton	Pleasant Valley Hospital	Point Pleasant
Boone Memorial Hospital	Madison	Pocahontas Memorial Hospital	Marlinton
Charleston Area Medical Center (CAMC)		Raleigh General Hospital	Beckley
General	Charleston	Roane General Hospital	Spencer
Memorial	Charleston	Thomas Memorial Hospital	South Charleston
Teays Valley	Hurricane	Valley Health	
Women & Children's	Charleston	Hampshire Memorial Hospital	Romney
Davis Health Systems		War Memorial Hospital	Berkeley Springs
Broaddus Hospital	Philippi	VA Medical Center	Huntington
Davis Medical Center	Elkins	Welch Community Hospital	Welch
Grant Memorial Hospital	Petersburg	WVU Medicine	
Greenbrier Valley Medical Center	Ronceverte	Braxton County Memorial Hospital	Gassaway
Logan Regional Medical Center	Logan	Camden Clark Medical Center	Parkersburg
Minnie Hamilton Health System	Grantsville	Fairmont Medical Center	Fairmont
Memorial Health System		Jackson General Hospital	Ripley
Sistersville General Hospital	Sistersville	Jefferson Medical Center	Ranson
Mon Health		J.W. Ruby Memorial Hospital	Morgantown
Grafton City Hospital	Grafton	Potomac Valley Hospital	Keyser
Marion Neighborhood Hospital	White Hall	Princeton Community Hospital	Princeton
Mon Health Medical Center	Morgantown	St. Joseph's Hospital	Buckhannon
Preston Memorial Hospital	Kingwood	Summersville Regional Medical Center	Summersville
Stonewall Jackson Memorial Hospital	Weston	United Hospital Center	Clarksburg
Montgomery General Hospital	Montgomery	Wetzel County Hospital	New Martinsville
Mountain Health Network		Wheeling Hospital	Wheeling
Cabell Huntington Hospital	Huntington		

## **Hospital Call Numbers**

West Virginia Hospital	Initial Calls
Beckley ARH*	241
Summers County ARH*	14
Berkeley Medical Center	278
Boone Memorial Hospital *	44
CAMC-General*	204
CAMC-Memorial*	66
CAMC-Teays Valley*	88
CAMC-Women & Children's*	217
Davis Health Systems-Broaddus Hospital*	30
Davis Medical Center*	86
Free-standing emergency clinic	89
Grant Memorial Hospital*	42
Greenbrier Valley Medical Center*	87
Logan Regional Medical Center*	74
Minnie Hamilton Health System*	19
Memorial Health System-Sistersville General Hospital *	16
Mon Health-Grafton City Hospital*	17
Mon Health-Marion Neighborhood	18
Mon Health Medical Center*	73
Mon Health-Preston Memorial Hospital*	34
Mon Health-Stonewall Jackson Memorial*	35
Montgomery General Hospital*	18
Mountain Health Network-Cabell- Huntington Hospital*	255
Mountain Health Network-St. Mary's Medical Center	201
Mountain Health Network- Pleasant Valley Hospital*	25
Physician's Office	60
Plateau Medical Center*	36
Pocahontas Memorial Hospital*	9
Raleigh General Hospital*	103
Roane General Hospital*	37

\*notes Member Treatment Hospital

West Virginia Hospital	Initial Calls
Thomas Memorial Hospital*	101
Unknown hospital	330
Valley Health-Hampshire Memorial Hospital*	30
Valley Health-War Memorial Hospital*	37
Veterans Affairs Medical Center-Beckley	13
Veterans Affairs Medical Center- Clarksburg	5
Veterans Affairs Medical Center- Huntington*	13
Veterans Affairs Medical Center- Martinsburg	7
Webster County Memorial Hospital	6
Weirton Medical Center	6
Welch Community Hospital*	37
WVU Medicine-Berkeley Medical Center	278
WVU Medicine-Braxton County Memorial Hospital*	29
WVU Medicine-Camden Clark Medical Center*	206
WVU Medicine-Children's	27
WVU Medicine–Fairmont Medical Center*	77
WVU Medicine–Jackson General Hospital*	38
WVU Medcine-Jefferson Medical Center*	104
WVU Medcine-J.W. Ruby Memorial Hospital*	210
WVU Medicine-Potomac Valley Hospital*	27
WVU Medicine-Princeton Community Hospital*	134
WVU Medicine-Princeton Community Hospital Bluefield*	52
WVU Medicine-Reynolds Memorial Hospital	98
WVU Medicine-St. Joseph's Hospital*	95
WVU Medicine-Summersville Regional Medical Center*	45
WVU Medicine-United Hospital Center*	157
WVU Medicine-Wetzel County Hospital	24

WVU Medicine-Wheeling Hospital\*

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## **Mountain State PoisonLine**

#### Mountain State PoisonLine Articles-2022

#### Volume 17, Issue 1: January-April

What's New in Toxicology: Synthetic Nitazene Opioids Clinical Toxicology Pearls: It is Really CBD

Poisoning Pitfalls: Some Hospital Laboratories Change Acetaminophen Testing Detection Limits Multidisciplinary Toxicology Case: Misapplication of Urine Drug Screens

#### Volume 17, Issue 2: May-August

What's New in Toxicology: Edibles Clinical Toxicology Pearls: Determining Cleaning Product Toxicity Following Ocular Exposures Poisoning Pitfalls: Vasopressor Dosing Multidisciplinary Toxicology Case: Methamphetamine

#### Volume 17, Issue 3: September-December

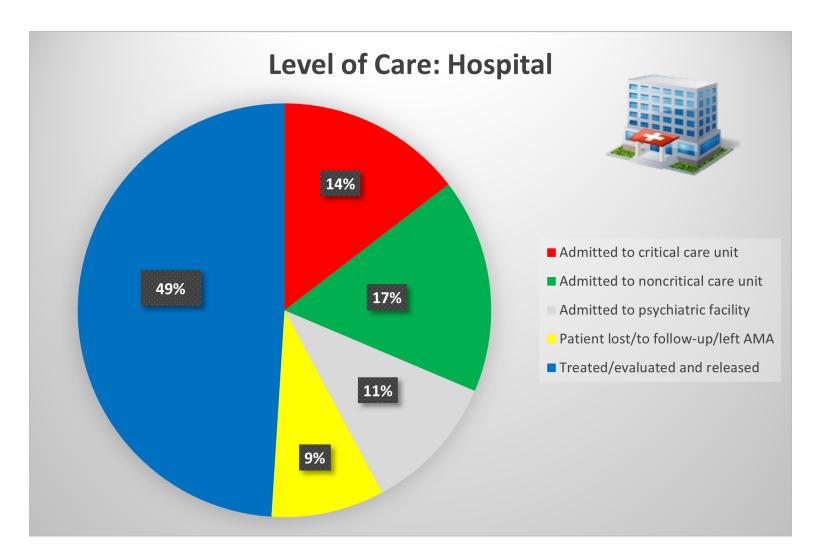
What's New in Toxicology: Paxlovid Interactions Resulting in Toxicity ECMO Use in the Poisoned Patient Clinical Toxicology Pearls: Xylazine or Opioid Effect Poisoning Pitfalls: Measuring the OTc Interval Multidisciplinary Toxicology Case: Carbon Monoxide

> The PoisonLine is distributed to all emergency departments and pharmacies in member treatment hospitals. The newsletter may be shared with all member treatment hospital employees.

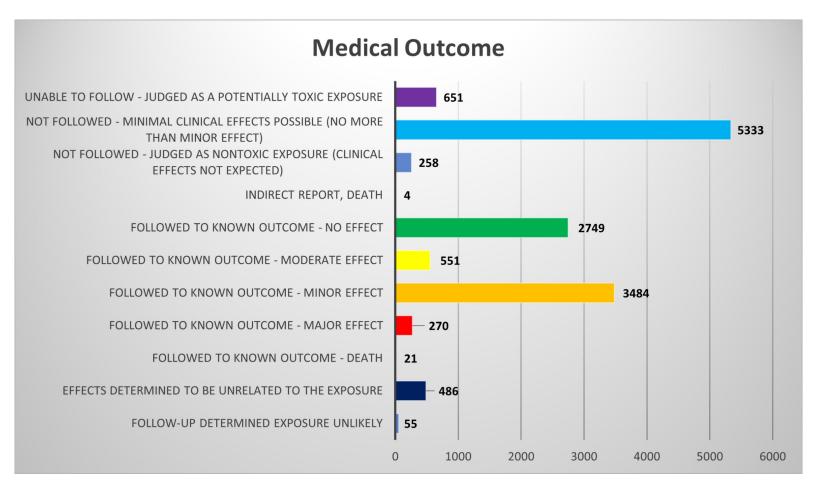


	<sup>2</sup> Mountain State PoisonLine
Volume 14, Is:	ae 1 January-April 2019
INSIDE	WHAT'S NEW IN TOXICOLOGY
	1
	sa Antivenom Options There is a new antivenom available in the United States (U.S.) for crotalidae
	There is a new antivenom available in the United States (U.S.) for crossing envenomations (e.g., rattlesnakes). The antivenom is Crotalidae Immune F(ab'); (Equine) - brand name ANAVIP. It's stated advantate over Crotalidae Polyvalent
	4 Immune Fab (Ovine) - brand name CroFab - is its longer half-life. The longer half- life is potentially an advantage following rattlesnake evenomations in which re-
	s occurrence of coagulopathies are known to occur following initial control of bleeding. Whether the longer half-life is of any advantage following copperhead
EDITOR	
Eltabeth J. Schama Pharm.D., DalilaT, BCPS, FAACT Director, WV Polyon I Professor, WVU Scho of Pharmacy	
Michael Abesemis. 1	

# Level of Care: Health Care Facility

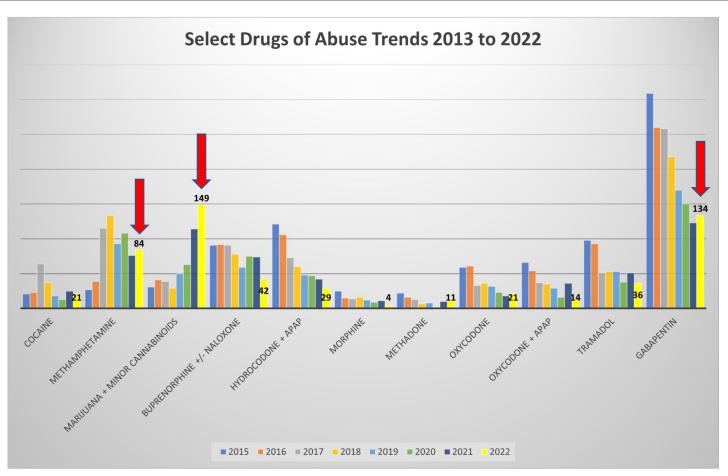


## **Medical Outcome**



Outcomes can be determined as follow-up calls are conducted for cases in which symptoms have occurred or more than minor symptoms are expected to occur. All hospital cases are followed-up until discharge. Total number of follow-up calls in 2022= 22,716

## **Drugs of Abuse Trends**



The WVPC tracks overdoses of all drugs of abuse, not just opioids. This is important as many of these drugs/substances of abuse can cause serious injury or death in addition to risks for violence, crime, and addiction. In addition, decreases in the use of one drug/substance of abuse results in increases in the use of another drug/substance for the same purpose. Marijuana (includes minor cannabinoids) cases doubled in children < 6 years of age between 2021 and 2022.



West Virginia Poison Center Annual Report 2022

## **Naloxone Administration**

Non-Health Care Provider Type	Total
Naloxone Fire	30
Naloxone Lay Public	427
Naloxone Other	5
Naloxone Police	13
Naloxone School RN	0
Grand Total	475

The WVPC tracks naloxone administration by fire departments and law enforcement (police) for the WV Office of Emergency Medical Services as required by WV Naloxone Legislation. The Poison Center also assists local health departments by tracking the use of naloxone as reported at the time of naloxone refills.

COUNTY	Naloxone Fire	Naloxone Lay Public	Naloxone Other	Naloxone Police	Total
Berkeley		55	1	4	60
Cabell		53	1		54
Fayette		1			1
Grant		2			2
Greenbrier	1	128	2		131
Harrison	4	24		2	30
Jefferson		22			22
Kanawha	2	7		6	15
Mercer		1			1
Mineral		1	1		2
Mingo	1				1
Monongalia	17	83		1	101
Morgan		38			38
Nicholas	3				3
Raleigh		7			7
Wayne		1			1
Wood	2	2			4
Unknown		2			2
Grand Total	30	427	5	13	475

# Naloxone Administration-Drugs Reported in Overdose

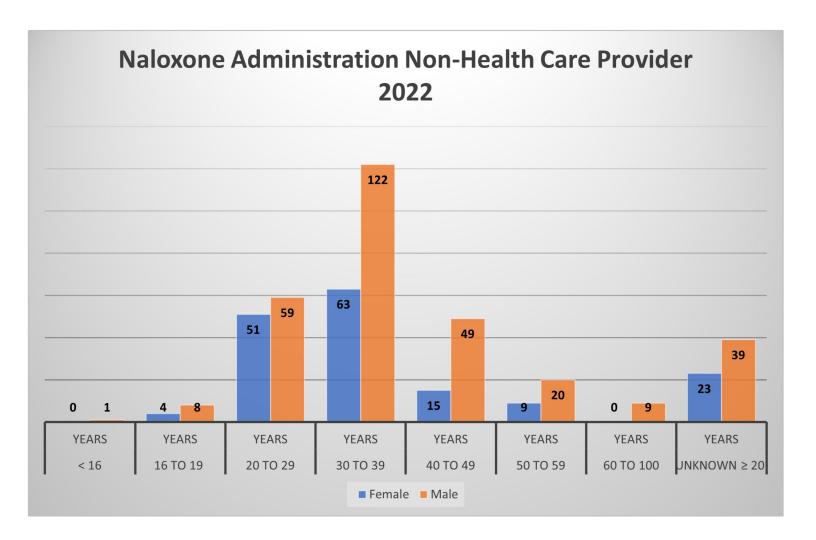
These substances are those reported to have been taken by the person receiving naloxone; or, substances noted to be present at the scene of the overdose. In many cases, what the person thought to be heroin could have actually been fentanyl, a fentanyl analog, or other opioid.

Substance 1	Column1
Heroin	315
Fentanyl	93
Opioid other or unknown type	52
Unknown drug	5
Other drug of abuse non-opioid	1
Stimulant drug of abuse	5
Alprazolam, Clonazepam. Lorazepam	4

Substance 2	Column1
Fentanyl	57
Methamphetamine	16
Heroin	8
Other or unknown opioid	4
Alcohol	3
Marijuana	2
Alprazolam	1
Cocaine	1
Unknown drug	1

Substance 3 and 4	Column1
Methamphetamine	3
Fentanyl, other opioid	3
Marijuana	2
Alprazolam, unknown stimulant (1 each)	2

### **Naloxone Administration-Continued**



Naloxone Formulation	# of Times Used
Naloxone 2 mg with nasal atomizer	43
Naloxone 4 mg or 8 mg nasal spray	325
Naloxone autoinjector	54
Naloxone intramuscular	59
Naloxone unknown formulation	26
Grand Total (some received > 1 type)	507

## Naloxone Administration-Management Site and Outcome

Management Site	Naloxone Fire	Naloxone Lay Public	Naloxone Police	Nalox- one Other	To- tal
In (enroute to) HCF - Admitted to critical care unit	1	1		1	3
In (enroute to) HCF - Admitted to noncritical care unit		1			1
In (enroute to) HCF - Admitted to psychiatric facility		1			1
In (enroute to) HCF - Patient lost to followup/left AMA		55	5		60
In (enroute to) HCF - Treated/evaluated and released	1	2	4		7
Managed on site (non health care facility)	11	357	3	4	375
Ambulance, EMT, 911, police managed on site	1				1
Referred to HCF - Patient refused referral/did not go	15	3	1		19
Unknown	1	7			8
Grand Total	30	427	13	5	475

HCF = health care facility (hospital); AMA = against medical advice

Medical Outcome	Naloxone Fire	Naloxone Lay Public	Naloxone Police	Naloxone Other	Total
Followed to known outcome - Death	1	3		1	5
Followed to known outcome - Major effect	29	420	11	4	464
Followed to known outcome - Minor effect					
Followed to known outcome - Moderate		1			1
Followed to known outcome - No Effect					
Unrelated Effect			1		1
Unable to follow - Judged as a potentially		3	1		4
Grand Total	30	427	13	5	475

# Novel Synthetic Drugs of Abuse

#### **Frequently Asked Questions**

- When did novel synthetic drugs of abuse become popular? These drugs began appearing in the United States around 2009 The first outbreak occurred in WV in the early months of 2011 when 139 cases of "bath salt" exposure were reported to the WV Poison Center. What are the types of novel synthetic drugs of abuse available for purchase? Novel Synthetic Cathinones (commonly called "bath salts") Novel Synthetic Cannabinoids (commonly called "Spice", "K2", "synthetic marijuana") Novel Synthetic Phenethylamines (e.g., 2C-series, 5-Me MDA, DOB, DOI) Novel Synthetic Tryptamines (e.g., 5-MeO DiPT, DPT) Novel Synthetic Benzodiazepines (e.g., etizolam, diclazepam) Novel Synthetic Opioids (non-pharmaceutical fentanyl, fentanyl analogs, U-47700) Novel Synthetic Piperazines (e.g., DBZP, MEOPP) Novel PCP Homologs/Analogs (e.g., PCE, deschloroketamine) Novel Synthetic LSD Homologs/Analogs GHB Analogs (GHV, GVL) Novel Synthetic Pipradols (methylnaphthidate) There are hundreds of these drugs coming in and out of circulation. As controlled substances are changed to make a specific drug illegal, alterations of the drug are made to make a new substance not yet considered
- Is each drug of the same type equally toxic?

to be illegal.

- No. While some have similar toxic effects on the body, some will have completely different toxic effects and different durations of toxicity. The WV Poison Center keeps track of known toxicity patterns for these drugs of abuse.
- Can these drugs be easily identified as being present in WV?

No. Tests to identify many of these drugs have not been invented yet.

## **Community Outreach**

The West Virginia Poison Center has **one** Community Outreach Coordinator. Due to funding cuts, the Community Outreach Coordinator is **part-time** and covers outreach for all 55 counties at **22.5 hours a week.** 

The Community Outreach Coordinator, Poison Center volunteers, and community partners go into WV communities to provide poison prevention education and poison center awareness programs for parents, children, senior service organizations, and community groups.

All 55 West Virginia counties were reached with poison prevention awareness and WVPC information throughout the year.



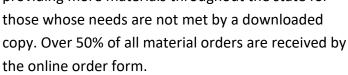
Public Education Activities*					
	Community Outreach Coordinator	Volunteers/ Community Partners	Total		
Fairs/Special Events	3	5	8		
Presentations	15	11	26		

<sup>#</sup> number officially reported to the WVPC. Each year other presentations and events with WVPC information are provided throughout the state and not officially reported.

# Community Outreach Materials

Although the Community Outreach Coordinator is part-time and has a small budget, **over 51,500 pieces** of poison prevention and WVPC materials were distributed throughout the state during the pandemic.

	Programs and I	materials are provid	ed to:
Daycare centers Physician offices Professionals	Schools Hospitals Communities		Clinics Families/individuals Senior centers
Everytic conversion of the con	What About Plants? Can you identify the poisonous plants in your home & backyard?	Order Form for Free Poison Preven	Last Name *
	Bites and Stings	providing more	form on the WVPC website assists in materials throughout the state for



Emergency Line

# National Poison Prevention Week 2022

National Poison Prevention Week occurs each year during the third full week of March. In 2022, this was March 20-26.

The West Virginia Poison Center selects a theme based on items of special importance in West Virginia.

#### WVPC National Poison Prevention Week 2022 Theme:

Did You Know? What the West Virginia Poison Center can do for you?



For National Poison Prevention Week (NPPW) 2022, the WVPC focused on topics residents of West Virginia may not know about the West Virginia Poison Center or poisons. Each day of March, the WVPC shared a new topic.

The WVPC also partnered with UniCare to provide poison prevention information throughout the state during March.

The WVPC also worked on items for NPPW 2022 with other poison centers around the nation including: Become a Poisoning Prevention Hero, a Creepy Crawlies information video, a Kahoot game tailored to teens, Meet a Toxicologist video, Poison Myth vs. Fact information, and Poison Brain Games.

1-800-222-1222



The West Virginia Poison Center sends press releases to all West Virginia media about topics important to West Virginia citizens based on surveillance of poison center calls to identify areas of current poisoning trends.

West Virginia media outlets were provided with 10 press releases throughout 2022.

#### **Topics included:**

COVID-19 Test Kit Safety

Cold and Flu Medication Safety

Acetaminophen Safety

National Poison Prevention Week

Edibles

Medication Safety for Teens and Young Adults

Halloween Safety

Holiday Travel Safety

**Holiday Safety** 

Known Media Placements		
Newspapers Television		
6*	18*	

\*Number of media placements officially captured by the WVPC. Each year other placements happen, but are not captured.

## **Always Remember:**





The West Virginia Poison Center provides fast, free, confidential, emergency poison information to West Virginians 24 hours a day, seven days a week. The Poison Center is staffed by nurses, pharmacists, and physicians with special training in the treatment of poisonings. *www.wvpoisoncenter.org*