

Annual report 2022



Tox Info Suisse is the home of poisoning information and advice for private individuals, experts and industry.

Key services at a glance:

- 24/7 emergency hotline 145
- Information and advice relating to poisoning for the general public and medical professionals
- Consultation related to poisons (for theoretical enquiries, Tel.: 044 251 66 66)
- Tox Info App (free for iOS and Android)
- Antidote monographs and treatment schemes
- Risk assessments and expert opinions
- Pharmacovigilance of veterinary drugs
- Poisoning prevention
- Accredited training site for specialist medical training in clinical pharmacology and toxicology
- Research and education
- Consultation and services for companies

Cover image:

Cleaning products – Tox Info Suisse, Zurich

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Dear Reader,

Our around-the-clock service continues to be appreciated and very much needed. This is shown by the call figures, which were 2.5% higher in 2022 than the previous year, and the growing interest in the informative articles on our website (www.toxinfo.ch). Letters of thanks and individual donations provide further motivation for our employees at Tox Info Suisse and demonstrate how valuable it is to receive personal, expert information in an emergency situation. A recent survey we conducted of 700 doctors also confirmed their satisfaction with our consultation.

For many years, Tox Info Suisse has been financially supported as part of a public-private partnership with various organisations. Further supporters could be obtained in 2022, however the financial reserves of Tox Info Suisse are dwindling in the medium term to a concerning level. The operational business is defined by a structural deficit, while larger investment is needed in our consultation software. We would like to thank everyone who has actively supported the Swiss poison information centre to date and all our new supporters in the future!

Cleaning products like those in the cover image can be found in most households. Everywhere needs cleaning and accidents can happen quickly. Fortunately, most accidents are minor, but in rare cases the outcome can be serious. Read about the effects of an accident with household products and how you can prevent accidents in our focus topic.

Finally, a few words about a key change:

Dr. Hans Rudolf Keller left Tox Info Suisse on 31 December 2022. He was the Managing Director ad interim since October 2019 and subsequently appointed as Chair of the Foundation Council. As a result of his inclusive personality he provided stability for Tox Info Suisse during an initially turbulent phase and introduce the necessary digital transformation. Thanks to his tireless initiative, he also largely secured funding for the operational business for 2024–2028. The Foundation Council and all our staff would like to thank him wholeheartedly for his outstanding commitment and wish him all the best!

On 1 January 2023, **Annette Messer** took over as Chair and, together with the Foundation Council, is looking forward to leading Tox Info Suisse confidently into the future as a high-quality public service.

Annette Messer
Chair of the Foundation Council

Damaris Ammann
Managing Director

Toxicological expertise and consultation continue to be in high demand

In 2022, the core tasks of Tox Info Suisse remained telephone advice in response to toxicological emergencies and answering questions about prevention. The extensive specialist knowledge of our toxicologists was also in demand for numerous other activities in the public domain.

Telephone helpline around the clock

In 2022, we provided advice in response to 40 583 enquiries (+2.5% compared with 2021). About 70% of the enquiries originated from the general public, approximately 25% from medical professionals and the rest from other sources. Enquiries from the general public increased (+2.5%), enquiries from hospitals remained stable. We saw a slight reduction in enquiries from general practitioners of approx. 6%, however, enquiries from veterinarians rose by 8%. The call frequency from pharmacists also increased by about 20%. The website with up-to-date information related to poisoning was visited 698 534 times (+5% compared with 2021).

Experts on duty

In addition to its emergency telephone service, Tox Info Suisse compiled expert opinions, reports and case analyses for industry and authorities. Senior medical staff took part in clinical toxicology consultations at the University Hospital of Zurich. Tox Info Suisse was also responsible for providing emergency medical advice for pharmaceutical companies, especially outside office hours. Activities also included advice and support relating to safety data sheets and emergency unblinding in clinical trials. Experienced staff additionally responded to various press enquiries.

Active role in the Swiss antidote network

Together with representatives of the Swiss Association of Public Health Administration and Hospital Pharmacists (GSASA) and the Swiss Military Pharmacy, Tox Info Suisse ensured antidote supply in Switzerland as mandated by

the Swiss Conference of Cantonal Ministers of Public Health (GDK). Tox Info Suisse is also responsible for updating the Swiss antidote list and publishing monographs and leaflets on antidotes.

Education

Prof. A. Jetter, Head of scientific services and training site at Tox Info Suisse gave lectures for medical students at the University of Zurich. Academic staff at Tox Info Suisse regularly gave lectures as part of professional and continuing education for doctors, other healthcare personnel and professional associations. In addition, once a week structured training sessions were held for staff of Tox Info Suisse and the Clinic for Clinical Pharmacology and Toxicology of the University Hospital of Zurich.

Scientific activities

As part of its association with the University of Zurich, research projects were conducted under the guidance of Prof. A. Jetter and C. Reichert. The key topics were toxicology and the dose-response relationship in human poisoning. Part of this work was performed by doctoral and master students and the results were presented at national and international conferences. Publications of completed projects are listed on page 22 and can be found on the website.



for iOS (Apple Store)



for Android (Google Play)

The Tox Info App was created in 2015 and was developed with the support of the Swiss Federal Office of Public Health (FOPH). It provides advice on first-aid measures, explains the hazard symbols for chemical products and presents news in the domain of human toxicology. To make it easier to identify noxious agents, EAN barcodes and photos can be sent directly to Tox Info Suisse using the app when calling the emergency hotline 145. Downloading the Tox Info App is free of charge for iOS and Android operating systems in Switzerland and neighbouring countries.

Poisoning with caustic substances

Accidents with caustic substances can happen quickly. Many household products contain acids, however, as these are usually present in low doses and are harmless to people, accidents typically only cause mild irritation. A few products, which contain alkalis or strong acids, can lead to serious burns. Some typical enquiries received by Tox Info Suisse are listed in the following.

Descaling agents – accidents when preparing beverages

Accidents with descaling products for coffee machines or kettles are a common occurrence: Adults enjoy a cup of coffee from a coffee machine that still has some descaler inside or they make a cup of tea with a mixture of water and descaler from the kettle. In children, these mixtures are used to prepare a bottle or infant food, therefore often affecting children up to the age of two. Non-commercial descaling agents, for example, contain sulfamic acid, lactic acid or citric acid, and vinegar is also often used. These acids do not have a strong caustic effect in the concentrations contained and usually therefore cause no symptoms or mild symptoms at most such as burning in the mouth or oesophagus, nausea, vomiting or diarrhoea.

Important: Maleic acid can cause severe kidney damage in dogs.



Image: Tox Info Suisse

Several descaling agents contain maleic acid, which is non-hazardous to humans. However, dogs that have consumed a product containing maleic acid require prompt veterinary treatment.

Sodium hypochlorite plus acid – cleaning accidents

Sodium hypochlorite is used for cleaning as well as being contained in mould removal products. Household products with sodium hypochlorite have low concentrations and accidents only cause irritation.

Important: Mixing sodium hypochlorite with acids produces chlorine gas, which has a strong irritant effect on the respiratory tract.

Cleaning accidents occur regularly when a sodium hypochlorite-based product is used together with an acidic cleaning agent, such as a descaler. Inhaling chlorine severely irritates the respiratory tract. Household accidents are usually mild as the symptoms occur rapidly and are extremely unpleasant, which means the person immediately leaves the area where chlorine gas is being produced. In general, the irritation of the upper respiratory tract is only temporary with burning of the eyes, nose and throat, tearing, sneezing, coughing, hoarseness, shortness of breath, nausea or vomiting. Patients with pre-existing respiratory diseases (asthma, allergies) may experience more severe symptoms and for a longer period. Prolonged exposure and/or high concentrations may result in more severe symptoms (severe burning of the mucous membranes, distressing irritation of the throat, difficulty in breathing, chest pain). If exposure continues despite symptoms of irritation, this may give rise to a pulmonary oedema, which typically occurs with a latency period of up to three days.

There is no specific therapy. In mild cases, inhaling water vapour can provide relief. Serious cases require hospital treatment. Depending on the symptoms, medication for coughing or oxygen can be administered, for example, and in extremely rare cases, artificial respiration may be needed.

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Severe burns – poisoning with alkalis or strong acids

Poisoning incidents that result in severe burns are fortunately rare. From 2010 to 2022, Tox Info Suisse advised in 95 severe burn cases in which the clinical outcome is known. 23 accidents involved children and 72 involved adults. The outcome was fatal for three of the adults. All of the children and 65 of the adults had ingested the substance. The remaining seven cases were occupational accidents with skin contact or splashes to the eye. For 31 of the adults the incident was an accident, 41 adults ingested the product as a suicide attempt.

Important: Oven, grill and drain cleaners, milking machine cleaning agents, highly concentrated acetic acid, button batteries and ammonia water are all dangerous.

Products frequently involved in incidents relating to adults and children were oven, grill and drain cleaning agents. Whereas milking machine cleaning agents, highly concentrated acetic acid (80%) and button batteries were only ingested by children and ammonia water was only ingested by adults.

Oven, grill, drain, milking machine cleaners:
These products can contain strong alkalis such as sodium or potassium hydroxide, which are caustic even at low concentrations.

Highly concentrated acetic acid (80%):
Used in the home to preserve vegetables. Ordinary food vinegar contains 14% acetic acid maximum and is not caustic.

Button batteries: If a button battery remains stuck in the oesophagus, it can rapidly lead to serious burns. As a result of electricity flow, an alkali forms at one battery pole (cathode) and this causes burns in the narrow oesophagus. Batteries getting lodged in the throat predominantly occurs in toddlers who swallow a large lithium battery. A button battery retained in the oesophagus must be urgently removed in hospital, ideally within two hours of swallowing.

Ammonia water: Ammonia water is used in the illegal drugs trade to process cocaine salts and produce the free base. It is often stored in drinking containers, thereby resulting in mix-ups.



Image: iStock

Prevention

- All cleaning agents and detergents should be stored safely, especially safely away from children, and in their original container.
- Cleaning products that contain sodium hypochlorite should never be used together with other cleaning agents.
- Descaling products with maleic acid should only be used with caution in households with dogs.
- In households with young children, button batteries should be stored out of their reach.

Emergency hotline 145

In 2022, the number of calls rose by 2.5 % compared with the previous year. This further exceeded the threshold of 40 000 enquiries received in the highest-call years of 2017 and 2018. In the past 10 years, the information provided by Tox Info Suisse has increased by around 11 %.

The core service of Tox Info Suisse is its 24/7 emergency telephone helpline for the general public and medical professionals in all cases of acute or chronic poisoning. Tox Info Suisse also answers calls about theoretical exposure, thereby making a significant contribution to preventing accidental poisoning. All enquiries to the consultation service are electronically recorded in a database, which forms the basis for this annual report and for scientific evaluations to continuously improve the quality of consultations. The enquiries are, of course, subject to medical confidentiality and data protection requirements.

General overview of all enquiries

Number of enquiries

In 2022, Tox Info Suisse received 40 583 enquiries (+2.5 % compared with 2021).

Origin of enquiries

The largest proportion of enquiries came from the general public, which reflects its need for information and the widespread reputation of Tox Info Suisse. Physicians used our service a total of 8 371 times. The majority of these enquiries came from hospital physicians (7 411). General practitioners submitted 960 enquiries to Tox Info Suisse, 1 124 were received from emergency rescue services, 425 from nursing homes, 414 from pharmacists and 106 from veterinarians.

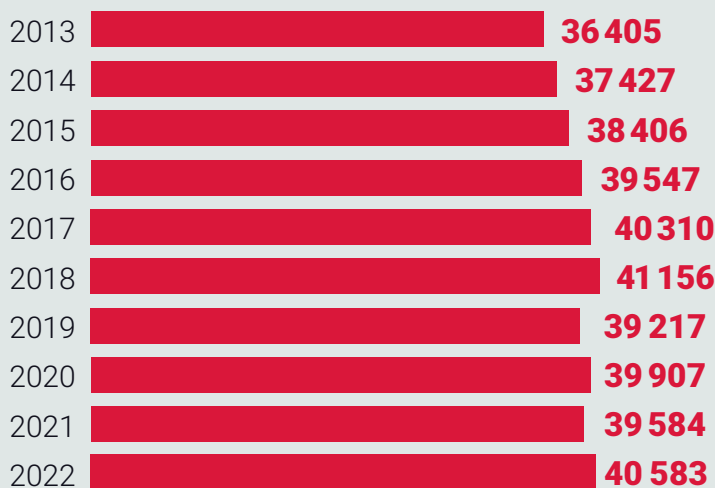
Tox Info Suisse also provided information 94 times to media such as newspapers, radio and television. This is 74 % more than in the previous year. The remaining enquiries came from industry, poison centres abroad and other or unspecified organisations.

Enquiries with or without toxic exposure

Calls can be categorised as enquiries of a theoretical nature without exposure and enquiries where an exposure has taken place.

Among the 2 670 theoretical enquiries without exposure, information was provided on drugs and antidotes, the toxicity of plants to children and pets as well as the risk of poisoning e. g. from household products, chemicals, drugs of abuse, spoiled food and venomous animals. The advice provided by Tox Info Suisse in these instances was predominantly of a preventative nature. This category of theoretical enquiries also includes advice and provision of documentation for authorities, the media, private individuals and various organisations as well as the distribution of fact sheets or referrals to relevant expert bodies.

The 37 909 consultations in total concerning toxic exposure involved 36 197 humans and 1 712 animals. The reason for calling was unknown in four instances.



In the past ten years, demand has risen by around 11 %.

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Origin of enquiries by cantons and callers

Canton	Population	General public	Hospital physicians	Practitioners	Pharmacists	Veterinarians	Various	Total	Calls/1000 inhabitants	
									Public	Physicians
AG	703 086	2 162	624	41	32	10	259	3 128	3.1	1.0
AI	16 360	46	–	2	–	–	4	52	2.8	0.1
AR	55 585	179	28	3	1	–	17	228	3.2	0.6
BE	1 047 473	3 686	1 022	117	47	21	518	5 411	3.5	1.1
BL	292 817	939	189	33	7	2	113	1 283	3.2	0.8
BS	196 036	647	374	30	21	2	86	1 160	3.3	2.1
FR	329 809	824	123	23	15	5	75	1 065	2.5	0.5
GE	509 448	1 267	339	57	61	4	213	1 941	2.5	0.8
GL	41 190	96	37	7	1	–	17	158	2.3	1.1
GR	201 376	493	230	26	11	2	49	811	2.4	1.3
JU	73 798	148	40	4	7	1	11	211	2.0	0.6
LU	420 326	1 195	301	50	8	6	166	1 726	2.8	0.8
NE	176 166	412	63	10	12	–	59	556	2.3	0.4
NW	43 894	100	21	2	–	–	6	129	2.3	0.5
OW	38 435	165	24	6	1	3	16	215	4.3	0.9
SG	519 245	1 470	410	63	19	4	184	2 150	2.8	0.9
SH	83 995	283	116	7	1	1	49	457	3.4	1.5
SO	280 245	929	193	34	5	3	97	1 261	3.3	0.8
SZ	163 689	404	95	20	5	1	48	573	2.5	0.7
TG	285 964	912	238	30	6	1	97	1 284	3.2	0.9
TI	352 181	617	266	45	15	3	42	988	1.8	0.9
UR	37 047	91	27	10	–	–	9	137	2.5	1.0
VD	822 968	2 169	358	63	57	12	220	2 879	2.6	0.5
VS	353 209	677	140	32	13	1	81	944	1.9	0.5
ZG	129 787	404	77	15	7	1	54	558	3.1	0.7
ZH	1 564 662	6 382	1 572	199	53	12	836	9 054	4.1	1.1
FL	39 308	194	13	4	2	–	14	227	4.9	0.4
Foreign	–	332	489	20	6	11	88	946	–	–
Unknown	–	930	2	7	1	–	111	1 051	–	–
Total	8 778 099	28 153	7 411	960	414	106	3 539	40 583	3.2	1.0
%		69.4%	18.3%	2.4%	1.0%	0.3%	8.7%	100%	–	–

Source of population figures: Swiss Federal Statistical Office, FSO / Liechtenstein authorities (cut-off date: 1.1.2022)

Poisoning of humans

Children younger than 5 years old most frequently affected

In 2022, Tox Info Suisse recorded 36 197 consultations for 33 865 cases. The highest number of cases was recorded for children younger than five years old (42.2%). Overall, more children (53.1%) were affected by toxic exposures than

adults (46.7%). Looking at the difference between the sexes, the number of cases is slightly higher for boys (52.0% versus 47.1%) whereas in adults, significantly more women are affected than men (57.9% versus 41.6%). This gender distribution has hardly changed over the years.

Age and gender distribution of human cases with toxic exposure

	Age	Female	Male	Unknown	Total			
Children		8 459	47.1 %	9 344	52.0 %	171	17 974	53.1 %
Age	< 5 years	6 618		7 590		81	14 289	
	5 – <10 years	784		970		7	1 761	
	10 – <16 years	871		563		3	1 437	
	unknown	186		221		80	487	
Adults		9 155	57.9 %	6 576	41.6 %	74	15 805	46.7 %
Age	16 – <20 years	886		411		4	1 301	
	20 – <40 years	1 645		1 455		2	3 102	
	40 – <65 years	1 187		1 086		1	2 274	
	65 – <80 years	380		264		–	644	
	80+ years	268		170		–	438	
	unknown	4 789		3 190		67	8 046	
Age unknown		27	31.4 %	13	15.1 %	46	86	0.3 %
Total		17 641	52.1 %	15 933	47.0 %	291	33 865	100 %

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Most toxic exposures are accidental, in other words unintentional. They primarily involve young children.

Accidental poisoning more common than intentional poisoning

A distinction must be made between the circumstances of poisoning: accidental (unintentional) exposure, intentional exposure and adverse drug reactions. Accidental exposure can be classified as domestic (within private residence including

garden), occupational (at the work place), or as a result of environmental exposure (caused by human activities via food, drinking water or breathing air). Intentional cases can be divided into suicides and attempted suicides, substance abuse and criminal poisoning (by a third party).

Circumstances of toxic exposure in humans

Circumstances		Acute poisoning (exposure ≤ 8h)		Chronic poisoning (exposure > 8h)	
Accidental domestic	24 486	72.3%	597	1.8%	
Accidental occupational	1 145	3.4%	54	0.2%	
Accidental environmental	11	0.03%	3	0.01%	
Accidental others	1 354	4.0%	62	0.2%	
Total accidental	26 996	79.7%	716	2.1%	
Intentional suicide	3 540	10.5%	57	0.2%	
Intentional abuse	707	2.1%	108	0.3%	
Intentional criminal	112	0.3%	16	0.05%	
Intentional others	629	1.9%	129	0.4%	
Total intentional	4 988	14.7%	310	0.9%	
Total accidental and intentional	31 984	94.4%	1 026	3.0%	
Total acute and chronic			33 010	97.5%	
Adverse drug reactions			138	0.4%	
Unclassifiable/others			717	2.1%	
Total			33 865	100%	

There is a distinction between acute exposure (≤ 8 hours) and chronic exposure (> 8 hours). Adverse drug reactions are also recorded, which

are defined as undesirable reactions in the context of therapeutic drug administration.

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Noxious agents

The noxious agents (harmful substances) involved in the enquiries were grouped into 12 categories. The distribution has not changed significantly from

the previous year. A supplement with details on the individual agent groups is available at www.toxinfo.ch.

Frequency of agent groups in all human cases with toxic exposure

Agent groups/ Age groups	Adults	Children	Age unknown	Total
Pharmaceuticals	6 461	5 810	21	12 292
Household products	2 868	5 201	13	8 082
Plants	772	2 388	7	3 167
Cosmetics and personal care products	363	1 688	–	2 051
Food and beverages (excl. mushrooms and alcohol)	1 097	975	10	2 082
Technical and industrial products	1 631	402	3	2 036
Recreational drugs and alcohol	669	418	8	1 095
Mushrooms	432	222	1	655
Agricultural and horticultural products	308	293	2	603
Venomous animals	345	113	4	462
Veterinary drugs	81	47	1	129
Other or unknown agents	778	417	16	1 211
Total	15 805	17 974	86	33 865
				100 %

Severity of poisoning

In 8 205 enquiries from physicians (98 % of the total number of physician enquiries), the cause of poisoning was foreseeable or pre-established. In these cases, the treating physicians received a written assessment from us in addition to the telephone consultation, as well as a request for a report on the outcome. Tox Info Suisse received feedback from physicians on the outcome of the poisoning in 62.2% of these cases. This expert medical information about the symptoms, clinical outcome and treatment of acute and chronic poisoning is entered in an in-house database, analysed and used to continually improve the quality of consultations related to poisoning.

Data capture and evaluation are standardised according to the circumstances of poisoning, causality of symptoms and findings, as well as the severity of poisoning. Severity is classified in terms of no symptoms, cases with minor, moderate or severe

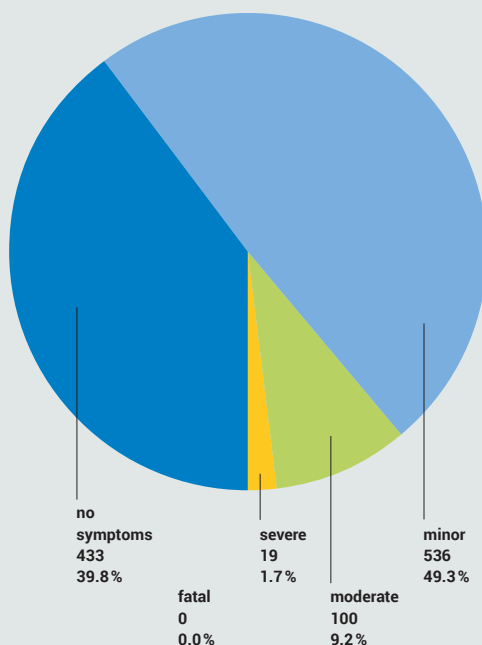
symptoms and cases that are fatal. Minor symptoms typically require no treatment, moderate symptoms usually need treatment, while treatment for all cases of severe poisoning is essential.

This annual report only takes into account poisoning where the causality was analytically confirmed or established as likely. Confirmed causality means that the noxious agent has been detected in the body, the timing and symptoms are compatible with the agent and the symptoms cannot be explained by an underlying illness or any other cause. Likely causality has the same criteria, but the agent has not been analytically detected.

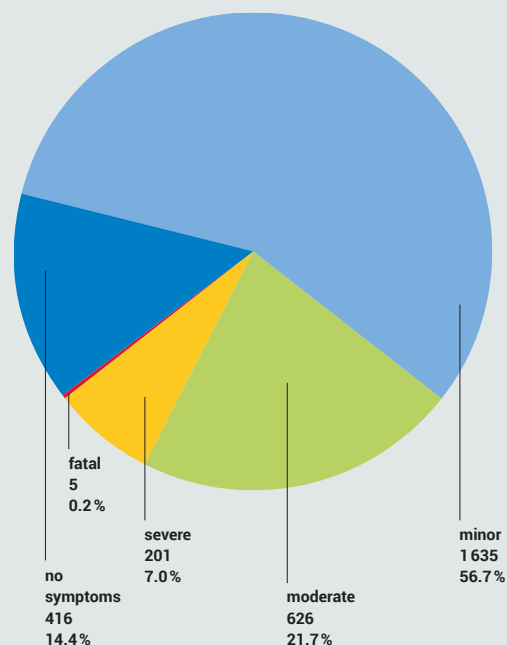
In total, 3 971 toxicological cases in humans had sufficient evidence of causality and could be further analysed with regard to the clinical course (–6 % compared with the previous year).

Clinical outcome in children and adults

Children (n = 1088)



Adults (n = 2883)



Of the 3971 responses from doctors relating to confirmed or likely causality, three fifths of cases involved monointoxication (toxic exposure from a single noxious agent). Two fifths of cases occurred as a result of combined intoxication. For reporting purposes these cases have been categorised according to the most important agent.

Frequency of agent groups and severity of human poisoning in cases where medical feedback could be analysed

Agent groups	Adults					Children					Total	
	N	Mi	Mo	S	F	N	Mi	Mo	S	F		
Pharmaceuticals	310	1027	400	142	3	266	301	66	15	–	2530	63.7%
Household products	28	136	25	6	–	69	113	10	1	–	388	9.8%
Technical and industrial products	27	191	34	3	2	17	26	4	1	–	305	7.7%
Recreational drugs and alcohol	11	119	90	34	–	21	24	5	1	–	305	7.7%
Mushrooms	7	36	29	–	–	7	9	3	–	–	91	2.3%
Plants	11	22	15	2	–	24	14	–	1	–	89	2.2%
Cosmetics and personal care products	8	21	1	2	–	11	24	3	–	–	70	1.8%
Food and beverages (excl. mushrooms and alcohol)	1	11	10	2	–	10	11	5	–	–	50	1.3%
Venomous animals	2	19	8	5	–	–	6	2	–	–	42	1.1%
Agricultural and horticultural products	5	15	–	1	–	2	–	1	–	–	24	0.6%
Veterinary drugs	2	4	–	–	–	–	–	–	–	–	6	0.2%
Other or unknown agents	4	34	14	4	–	6	8	1	–	–	71	1.8%
Total	416	1635	626	201	5	433	536	100	19	–	3971	100%

Severity of poisoning: N = no symptoms, Mi = minor, Mo = moderate, S = severe, F = fatal

Poisoning of animals

Affected animals

1 712 consultations relating to 1 678 cases concerned a wide range of different animals: 1 332 dogs, 290 cats, 15 equines (donkeys, horses), 14 bovines (bulls, calves, cows, goats, llamas), 12 lagomorphs (hares, rabbits, dwarf rabbits), 6 rodents (degus, guinea pigs, hamsters), 6 birds (chickens, other birds), 2 primates and 1 fish.

Frequency of agent groups in all cases of animal poisoning

Agent groups		No. of cases
Food and beverages (excl. mushrooms and alcohol)	427	25.4%
Plants	321	19.1%
Pharmaceuticals	314	18.7%
Agricultural and horticultural products	198	11.8%
Household products	163	9.7%
Veterinary drugs	56	3.3%
Technical and industrial products	41	2.4%
Recreational drugs and alcohol	28	1.7%
Cosmetics and personal care products	23	1.4%
Venomous animals	23	1.4%
Mushrooms	19	1.1%
Other or unknown agents	65	3.9%
Total	1 678	100%

Severity of poisoning

As with physicians, veterinarians were also asked for feedback on the outcome of the poisoning. Tox Info Suisse received a total of 46 reports on poisoning of animals that could be analysed.

Frequency of agent groups and severity of animal poisoning in cases where veterinary feedback could be analysed

Agent groups						Outcome	Total	
	Severity	N	Mi	Mo	S			
Pharmaceuticals		9	5	3	1	–	18	39.1%
Agricultural and horticultural products		6	2	–	–	–	8	17.4%
Veterinary drugs		3	2	–	–	–	5	10.9%
Household products		4	1	–	–	–	5	10.9%
Plants		4	–	–	–	–	4	8.7%
Food and beverages (excl. mushrooms and alcohol)		1	–	–	–	–	1	2.2%
Venomous animals		–	–	1	–	–	1	2.2%
Technical and industrial products		–	–	–	1	–	1	2.2%
Recreational drugs and alcohol		–	–	1	–	–	1	2.2%
Cosmetics and personal care products		–	1	–	–	–	1	2.2%
Mushrooms		–	–	–	–	–	–	0.0%
Other or unknown agents		1	–	–	–	–	1	2.2%
Total		28	11	5	2	–	46	100%

Severity of poisoning: N = no symptoms, Mi = minor, Mo = moderate, S = severe, F = fatal

Financial statements

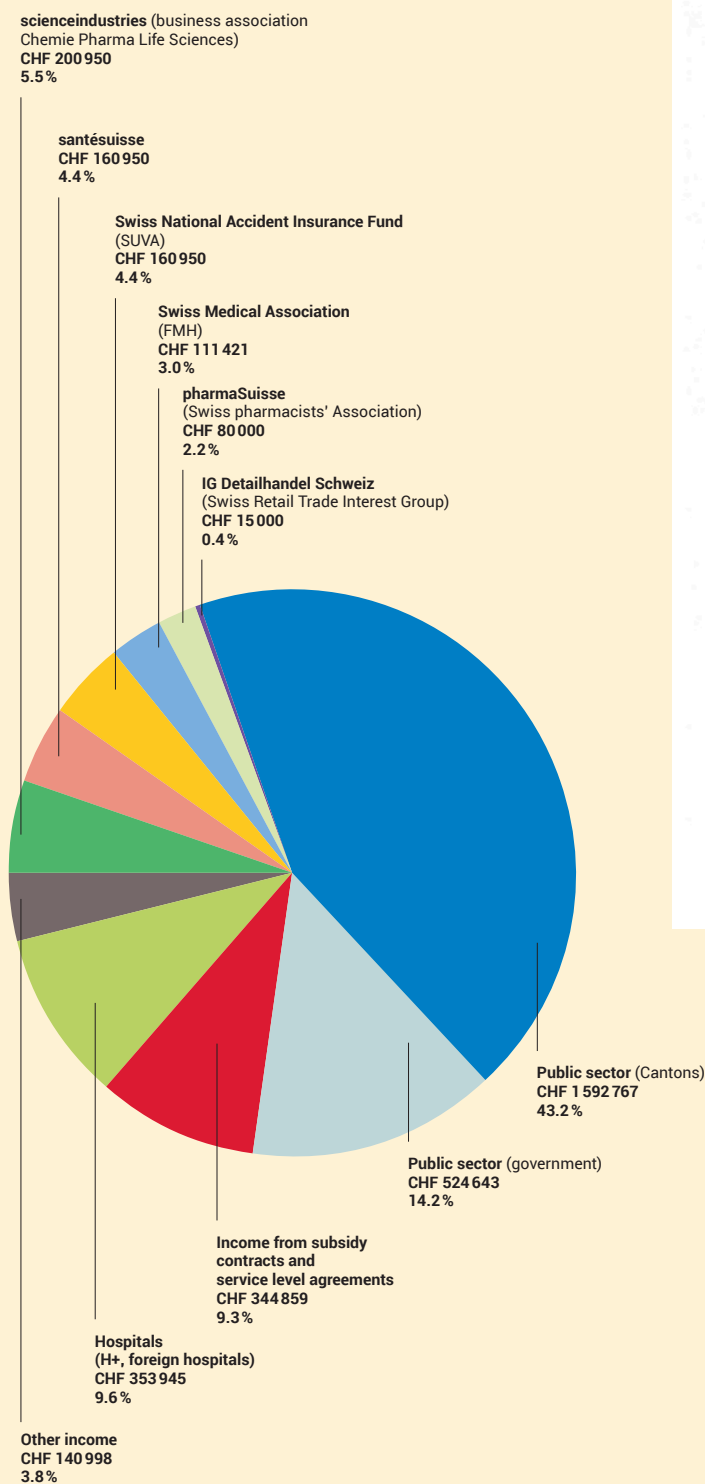
Income statement

Income	2022	2021
	CHF	CHF
Contributions from founders and supporters	729 271	714 270
Subsidy contracts and service level agreements		
Confederation	524 643	522 543
Cantons	1 592 767	1 408 062
Hospitals (H+, foreign)	353 945	350 263
Others	344 859	344 926
Professional fees and expert reports	3 193	1 730
Donations	95 208	105 240
Other income	42 597	47 805
Total income	3 686 482	3 494 839
Expense		
Staff	3 298 688	2 936 671
Property expenses	174 824	168 586
IT	339 236	310 789
Office and administration	61 708	81 351
Communication	15 940	17 123
Literature and archiving	12 054	14 340
Other operating expenses/ strategic projects	1 400	109 907
Total expense	3 903 850	3 638 767
Operating result	- 217 368	- 143 928
Financial income	14	- 3 171
Financial expense	- 5 533	- 337
Total financial result	- 5 519	- 3 508
Liquidation of provision to ensure liquidity	-	150 000
Annual profit/loss	- 222 887	2 564

Balance sheet at 31st December

Assets	2022	2021
	CHF	CHF
Current assets		
Cash	3 008 662	3 186 334
Accounts receivable	481 104	378 866
Other current receivables	96	-
Prepaid expenses and accrued income	4 415	23 294
Total assets	3 494 276	3 588 494
Equity and liabilities		
Current liabilities		
Accounts payable	10 661	12 042
Other current liabilities	136 748	23 206
Accruals and deferred income	221 976	205 468
	369 386	240 716
Non-current liabilities		
Provision for IT	240 000	240 000
Provision for research	260 000	260 000
Provision to ensure liquidity	1 950 000	1 950 000
	2 450 000	2 450 000
Equity		
Foundation capital	100 000	100 000
Voluntary retained earnings	300 000	300 000
Capital reserves to ensure liquidity (founder and supporter contributions)	400 400	400 400
Retained earnings	-125 509	97 378
- Profit carried forward	97 378	94 813
- Annual profit/loss	-222 887	2 564
	674 891	897 778
Total equity and liabilities	3 494 276	3 588 494

Source of income



Auditor's report

Revision
Beratung

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CH-5401 Baden

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info@serves.ch

www.serves.ch
CHF-113.985.513



To the foundation board of
Stiftung Tox Info Suisse
8032 Zürich

Report of the statutory auditors on the limited statutory examination

As statutory auditors, we have examined the financial statements (balance sheet, statement of operations and notes) of the foundation 'Stiftung Tox Info Suisse' for the year ended December 31, 2022.

These financial statements are the responsibility of the foundation board. Our responsibility is to perform a limited statutory examination on these financial statements. We confirm that we meet the licensing and independence requirements as stipulated by Swiss law.

We conducted our examination in accordance with the Swiss standard on the limited statutory examination. This standard requires that we plan and perform a limited statutory examination to identify material misstatements in the financial statements. A limited statutory examination consists primarily of inquiries of company personnel and analytical procedures as well as detailed tests of company documents as considered necessary in the circumstances. However, the testing of operational processes and the internal control system, as well as inquiries and further testing procedures to detect fraud or other legal violations, are not within the scope of this examination.

Based on our limited statutory examination, nothing has come to our attention that causes us to believe that the financial statements do not comply with Swiss law and the foundation's articles of incorporation.

Baden, 27 April 2023

Serves Audit AG



Stefan Hummel
Auditor in charge
Licensed audit expert
RAB-Nr. 112554



Andrea Friedli
Licensed auditor
RAB-Nr. 112996

Annex:
Balance Sheet, Statement of Operations, Notes

TREUHAND | SUISSE
Schweizerischer Treuhänderverband

Thanks to all our donors

Tox Info Suisse is a charitable non-profit private foundation. A considerable part of its funding comes from donations from companies, organisations and private individuals, which are used specifically to support the poisoning information service.

Donations of and above 1 000

Each contribution helps to ensure the future of the poisoning information service!
We thank all donors in advance for their contribution to:

PostFinance:
IBAN CH20 0900 0000 8002 6074 7

Ernst Goehner Foundation (project contribution)	25 000
Jean Pierre Lorent	5 000
Bayer (Schweizerland) AG	3 000
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Pfizer AG	3 000
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The Swiss Cosmetic and Detergent Association	3 000
Unilever Schweiz GmbH	3 000
Josef Jansen-Stiftung	2 000
Mundipharma Medical Company	2 000
Reckitt Benckiser (Switzerland) AG	2 000
Schwyz Canton Medical Society	1 500
IBSA Institut Biochimique SA	1 000
Ideal Chimic SA	1 000
Roche Pharma (Switzerland) Ltd	1 000
RSG Europe GmbH	1 000
Zambon Switzerland Ltd	1 000

We are grateful for all the many smaller donations that are not listed here, which equally help us to continue our work, and we would like to take this opportunity to sincerely thank all our donors.

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Confirm amount and donation



Staff are, and will remain, the most important resource

The importance of continuing the Swiss poison information centre is a perennial theme in this section. In this regard, «staff» are our most valuable asset, as clearly shown in the past few years, and must not be underestimated. To enable Tox Info Suisse to continue to provide high-quality toxicological consultation around the clock in the future, working conditions must be oriented towards the needs of future generations.

Tox Info Suisse as an attractive employer

The pandemic has shown once again that the most valuable assets in healthcare are qualified and motivated employees. The diverse daily work, pleasant work culture and a friendly atmosphere all contribute to an extremely high average length of employment with Tox Info Suisse. To ensure it stays that way, a few parameters need to be adjusted: In 2022, the work schedule was adapted to the needs of our employees and various benefits were improved. For example, this enabled our medical consultants to polish their French and Italian language skills in individual coaching sessions. To date, it has not been possible to adjust salaries to reflect the market level and commitment to Tox Info Suisse is still primarily an affair of the heart. This needs to change – our service is vital for a functioning, cost-efficient healthcare and Switzerland should attach great importance to its provision.

Upgrade to the Swiss titles «Human toxicologist GfKT*» and «Clinical Toxicologist GfKT*»

Traditionally, Tox Info Suisse has invested a great deal in the continuing education of junior physicians. We are delighted when young specialists show interest in this niche medical field and without them, we could not maintain our 24/7 operation. The Swiss Society of Clinical Pharmacology and Toxicology (SGKPT) has pushed for all experienced medical staff at Tox Info Suisse with the poison centre-specific title «Human toxicologist GfKT*» or «Clinical toxicologist GfKT*», not only physicians with the relevant specialist title of FMH, to be able to officially take on responsibility for continuing

education. The Swiss Institute for Postgraduate and Continuing Education in Medicine (SIWF) has recognised this change since 2022. The well-deserved upgrade of the GfKT* title is a further incentive for our staff to aspire to this title, thereby ensuring that we can employ sufficient junior physicians at all times.

New consultation and service software

The consultation software being used currently has been in place since 2010 and has long ago reached the end of its lifecycle. The necessary preparations for the new, modern IT solution were completed in 2022 and a highly experienced software provider is now programming the new system. The new solution will reflect the current state of technology and offer efficient processes, significantly simplifying the consultant's work at Tox Info Suisse. The new software will be commissioned in 2024 and be continuously expanded, which is especially important in order to promptly implement new requirements.

* GfKT = German Society for Clinical Toxicology

The work of Tox Info Suisse enjoys broad support

Tox Info Suisse is a private foundation. It was founded in 1966 and is now based on a public-private partnership.

Founders and Supporters



pharmaSuisse is the Swiss pharmacists' Association. It is the founder of the Swiss Toxicological Information Centre in 1966, now Tox Info Suisse.



scienceindustries is the Swiss business association Chemie Pharma Life Sciences. It is the co-founder of the Swiss Toxicological Information Centre in 1966, now Tox Info Suisse.



santésuisse is the inter-trade organisation of Swiss health insurance companies in the domain of social health insurance.



Suva is the biggest institution in the field of compulsory accident insurance in Switzerland.



FMH is the professional association of physicians in Switzerland.

Partners



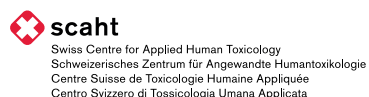
Tox Info Suisse is an associated institute of the University of Zurich in the domains of research and education.



Tox Info Suisse is involved with the European Association of Poisons Centres and Clinical Toxicologists (www.eapcc.org).

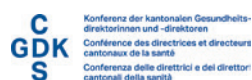


Tox Info Suisse collaborates closely with the Society of Clinical Toxicology (Gesellschaft für Klinische Toxikologie, GfKT) which is the professional society of the German-speaking poisons information centres and of clinical toxicologists.

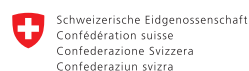


Tox Info Suisse is represented in the foundation council of the SCAHT.

Subsidy contracts and service level agreements



The services for the general public in Switzerland are regulated by a service level agreement with the Swiss Conference of Cantonal Directors of Public Health (GDK).



Eidgenössisches Departement des Innern EDI
Bundesamt für Gesundheit BAG

On behalf of the Swiss federal government and based on the Chemicals Act and Ordinance, Tox Info Suisse contributes significantly to emergency consultation and poisoning prevention.



H+ is the national central association of public and private hospitals, infirmaries, and nursing homes.



By order of the Swiss Agency for Therapeutic Products (Swissmedic) Tox Info Suisse provides pharmacovigilance of veterinary drugs.

The people behind Tox Info Suisse

Foundation Council

Chairperson: Hans Rudolf Keller, PhD, pharmaSuisse (until 31.12.2022), Annette Messer, pharmaSuisse (as of 1.1.2023)
Vice-Chairman: Michael Matthes, PhD, scienceindustries
Members: Michael Arand, PhD, University of Zurich / Orlando Bitzer, H+ / Philipp Brugger, GDK / Verena Nold, santésuisse / Ulrich Schaefer, PhD, pharmaSuisse / Jana Siroka, MD, FMH (until 31.12.2022) / Cantonal Government Councilor Petra Steimen-Rickenbacher, GDK / Josef Widler, MD, FMH (as of 1.1.2023) / Anja Zyska Cherix, MD, Suva.
Honorary members: Franz Merki, PhD / Elisabeth Anderegg-Wirth

Management

Managing Director: Damaris Ammann
Head Physician and Deputy Managing Director: Cornelia Reichert, MD
Senior physicians: Colette Degrandi, MD / Katrin Faber, MD / Katharina Hofer, MD (until 28.2.2022)
Head of scientific services and training site: Alexander Jetter, MD

Staff

Natascha Anders, nurse (until 31.8.2022) / Eugenia Becker, project leader (until 31.8.2022) / Ute Maria Bieser, MD (as of 1.9.2022), Alexandra Bloch-Teitelbaum, RPh / Danièle Chanson, executive assistant / certified translator / Trudy Christian, triage (until 30.4.2022) / Ioanna Farmakis, cleaning service / Mirjam Gessler, MD / Andrea Gretener, triage (as of 1.4.2022–31.12.2022) / Karen Gutscher, MD / Rose-Marie Hauser-Panagl, executive assistant / Teresa Hiltmann, MD / Cynthia Huppermans, physician (until 30.9.2022) / Evelyne Jina Prüss, MD / Noëmi Jöhl, physician / Irene Jost-Lippuner, MD / Seraina Kägi, MD / Michael Killian, physician / Helen Klingler, MD / Sandra Koller-Palenzona, MD / Birgit Krueger, physician / Jacqueline Kupper, DVM / Loredana Lang, triage / Max Maane, physician / Nadine C. Martin, MD / Franziska Möhr-Spahr, triage / Corinne Nufer, nurse / expert in emergency care / Sabrina Raggenbass, ICT support (as of 1.12.2022) / Louka Rieser, physician / Fritz Rigendinger, MD (as of 1.7.2022) / Miriam Scheuermann, HR manager (as of 1.4.2022) / Stefanie Schulte-Vels, physician / Joanna Stanczyk Feldges, MD / Jolanda Tremp, office management / Claudia Umbricht, IT / Margot von Dechend, MD (until 31.8.2022) / Anouk Zraggen, physician / Karin Zuber, triage.

Medical students: Sandra Bachmann (until 30.4.2022), David Balsiger (until 31.5.2022), Leandra Ehrat (until 30.11.2022), Hanna Fischer (until 30.9.2022), Adrian Frey, Isabella Gatti (as of 1.6.2022), Fides Georgi, Florian Hauser, Delia Hausheer (as of 1.6.2022), Lara Heer (as of 21.11.2022), Gilles Huber (as of 23.11.2022), Tobias Kälin, Lea Keller (as of 23.11.2022), Marie Lefebvre, Andreas Nadig, Miriam Stemmler (as of 1.6.2022), Yael Schollenberger (until 31.7.2022).

Advisors

Our circle of voluntary advisors include numerous experts from hospitals, institutes and state and federal offices, most notably professor Martin Wilks, MD (SCAHT).

Scientific publications

The list of scientific publications, dissertations and master theses can also be found on the website www.toxinfo.ch.

Suicide attempts by poisoning in adolescents and young adults in Switzerland before and after the beginning of the COVID-19 pandemic [abstract].

Degradandi C, Faber K.
Clin Toxicol 2022; 60 (suppl. 1): 98.

Suicide attempts by overdose of paracetamol and ibuprofen in adolescents and young adults in Switzerland before and after the beginning of the Covid-19 pandemic [abstract].

Faber K, Degrandi C.
Clin Toxicol 2022; 60 (suppl. 1): 98.

Exotic venomous snakebites in Switzerland reported to the National Poisons Information Centre over 22 years.

Fuchs J, Gessner T, Kupferschmidt H, Weiler S.
Swiss Med Wkly 2022; 152: w30117.

Possible envenomation by a sting by Pleurodeles waltl (Iberian Ribbed Newt) resulting in mild symptoms.

Fuchs J, Hvozدارa L, Weiler S.
Clin Toxicol 2022; 60: 137–39.

Characteristics of poisonings in infants up to three months of age: comparison of two ten-year time periods [abstract].

Gessler M, Hofer KE, Reichert C.
Clin Toxicol 2022; 60 (suppl. 1): 47–48.

Scombroid poisoning with sudden cardiac arrhythmia: an unusual case report [abstract].

Gessler M, Acerbis E, de Perna ML, Weiler S.
Prim Hosp Care 2022; 22 (Suppl. 12): 87–88.

Exacerbation of familial intrahepatic cholestasis in conjunction with COVID-19 vaccination.

Guri Y, Vosbeck J, Dickenmann M, Jetter A, Bernsmeier Ch.
J Hepatol 2022; 77: 872–874.

Effect of the first wave of COVID-19 on Poison Control Centre activities in 21 European countries: an EAPCCT initiative.

Hondebrink L, Zammit M, Høggberg LCG, Hermanns-Clausen M, Lonati D, Faber K.
Clin Toxicol 2022; 60: 1145–1155.

Opioid sales and opioid-related poisonings in Switzerland: A descriptive population-based time-series analysis.

Hooijman MF, Martinez-De la Torre A, Weiler S, Burden AM.
Lancet Reg Health Eur 2022; 20: 100437.

Pilzvergiftungen 2021.

Krueger B, Zoller B.
SZP – Schweiz Zeitschr Pilzkd 2022; 100: 26–29.

Acute toxicity profile of oxybutynin in overdose or accidental exposure: a consecutive case series [abstract].

Martin NC, Hofer KE, Reichert C.
Clin Toxicol 2022; 60 (suppl. 1): 83–84.

Schwere Systemreaktion nach einheimischem Schlangenbiss.

Ostini A, Schneider C, Reichmuth Ph, Schiesser F, Martin NC, Weiler S, Fuchs J, Brodmann Maeder M.
Schweiz Med Forum 2022; 22(00).

Ramipril – how toxic is it? [abstract].

Prasa D, Trompelt J, Gross S, Vagt A, Heier EC, Klumb W, Stedtler U, Färber E, Reichert C, Zatloukal C, Genser D, Gollmann M.
Clin Toxicol 2022; 60 (suppl. 1): 86–87.

Vergiftungen in der Schweiz.

Zur Beratungstätigkeit 2020 von Tox Info Suisse.
Reichert C, Degrandi C, Hofer KE.
Schweiz Aerzteztg 2022; 103: 510–14.

Amygdalin («Vitamin B17») – weder Vitamin noch Onkologikum.

Weiler S, Hofer KE.
Schweiz Med Forum 2022; 22: 59.

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