

# Dataset Report

Dataset: **000014**

Short title: **Vetcases**

Long title: Reports of notifiable diseases reported for *Apis mellifera* (L.)

Status: Approved

Version: 1.0

Date: 2023-06-13

Author: Michael Rubinigg, Noa Simon Delso

This document is intended for use by collaborators of the EU Pollinator Hub and may be passed on with the express permission of the leader of the consortium and for the purpose determined by the leader of the consortium.

## Table of contents

1	Document history .....	3
1.1	Release.....	3
1.2	Revision .....	3
2	Abbreviations.....	4
3	Executive Summary .....	5
4	Introduction.....	6
5	Material and Methods.....	7
5.1	Data Acquisition .....	7
5.2	Data Preparation .....	9
5.3	Data Validation .....	9
5.4	Data Analysis .....	9
6	Data Description.....	11
6.1	EUPH.....	12
7	References .....	26
8	Annexes .....	27

## 1 Document history

### 1.1 Release

Version 1.0 released on 2022-09-29. Written by Michael Rubinigg. Reviewed by Noa Simon Delso. Approved by Michael Rubinigg.

### 1.2 Revision

n.a.

## 2 Abbreviations

AFB	American foulbrood of honey bees
BMSGPK	Bundesministerium für Soziales, Gesundheit, Pflege und Konsumentenschutz (Austrian Federal Ministry of Social Affairs, Health, Care and Consumer Protection)
EFB	European foulbrood of honey bees
EFSA	European Food Safety Authority
FAVV-AFSCA	Federaal Agentschap voor de veiligheid van de voedselketen - Agence fédérale pour la sécurité de la chaîne alimentaire (Federal Agency for the Safety of the Food Chain)
KVG	Kommunikationsplattform Verbrauchergesundheit (Consumer Health Communication Platform)
n.a.	not available
StLVB	Steirischer Landesverband für Bienenzucht (Styrian Beekeepers Association)

### 3 Executive Summary

**Data overview:** This dataset contains a list of outbreaks of honey (*Apis mellifera* L.) disease from various sources in Austria and Belgium for which legislation provides for compulsory notification to the veterinary authorities (referred to as notifiable diseases).

**Data value:** This dataset was collected to provide an example for a comprehensive overview on the frequency and location of notified outbreaks of honey bee diseases in different countries and regions.

**Data description:** The dataset contains 5 files with outbreaks of notifiable diseases from Belgium and Austria.

**Data application:** This data is suited to produce concise tabular and graphical overviews and summaries on notified outbreaks of honey bee diseases in different countries and regions. Possible research questions include the following:

1. How does frequency of notified outbreaks of honey bee diseases change across regions and years?
2. Are there regions/locations with particularly high incidences of notified outbreaks of honey bee diseases?
3. What is the probability for the outbreak of a notifiable honey bee disease in a certain location considering typical flight distances of bees, frequency of outbreaks and the time elapsed since the last outbreak in a given location?

## 4 Introduction

This dataset contains a list of outbreaks of honey (*Apis mellifera* L.) disease from various sources in Austria and Belgium for which legislation provides for compulsory notification to the veterinary authorities (referred to as notifiable diseases).

Since 13.06.2022 (law no. 2022041357) Regulation (EU) 2016/429 from 09.03.2016 on transmissible animal diseases and amending and repealing certain acts in the area of animal health (“Animal Health Law”) entered into force. According to Article 18 the following notifiable honey bee diseases are listed in annex II: infestation with *Varroa* spp. (Varroosis), infestation with *Aethina tumida* (Small hive beetle), American foulbrood, infestation with *Tropilaelaps* spp.

In Belgium, until 10.06.2022 notification of honey bee diseases was regulated by the animal health law (*dierengezondheidswet / loi relative à la santé des animaux*), which entered into force on 27.04.1987 (law no. 19870106057). The following diseases had to be notified: infestation with the tracheal mite (*Acarapis woodi*), American foulbrood (*Paenibacillus larvae*), European foulbrood (*Melissococcus plutonius*), infestation with the small hive beetle (*Aethina tumida*), infestation with *Tropilaelaps* mites (*Tropilaelaps* spp). Since 17.07.2014 (law no. 2014024272) Varroosis has been removed from the list of notifiable diseases.

In Austria notification of honey bee diseases is currently regulated in the bee disease law (*Bundesgesetz vom 25. Mai 1988 über die Bekämpfung ansteckender Krankheiten der Bienen; Bienenseuchengesetz*), which entered into force on 25.05.1988 (law no. 290/1988). The following diseases have to be notified: American foulbrood (*Paenibacillus larvae*), infestation with the small hive beetle (*Aethina tumida*), infestation with *Tropilaelaps* mites (*Tropilaelaps* spp), Varroosis in case of an imminent or actual death of at least 30% of the colonies in an apiary. Since 05.07.2005 (law no. 67/2005) Nosemosis has been removed from the list of notifiable diseases. Regulation (EU) 2016/429 has not been implemented to date.

## 5 Material and Methods

### 5.1 Data Acquisition

Data on notified outbreaks of animal diseases in Austria were obtained from monthly animal health reports available on the Website of the Consumer Health Communication Platform (Kommunikationsplattform Verbrauchergesundheit, KVG) provided by the Austrian Federal Ministry of Social Affairs, Health, Care and Consumer Protection (Bundesministerium für Soziales, Gesundheit, Pflege und Konsumentenschutz, BMSGPK). Monthly issued animal health reports for 2015 (BMSGPK, 2015), 2016 (BMSGPK, 2016), 2017 (BMSGPK, 2017), 2018 (BMSGPK, 2018), 2019 (BMSGPK, 2019) and part of 2020 (BMSGPK, 2020), available in PDF and XLSX format, were downloaded from the website. Data from 2021 (BMSGPK, 2021) and 2022 (BMSGPK, 2022) was obtained from summary animal health reports available at the same location. Data on notified outbreaks of honey bee diseases for Belgium were obtained from a website provided by the Belgium food safety authority (*Agence Fédérale pour la Sécurité de la Chaîne Alimentaire*, FAVV-AFSCA) (AFSCA, n.d.). The data source for each record is referenced in the dataset.

*Table 1. List of raw data and metadata files included in the dataset. Row identifier (Id); name of the file (File); file contains data (D); file contains metadata (M); date of arrival of the file at the EU Pollinator Hub (Arrival); short name of the data provider (Provider).*

Id	File	D	M	Arrival	Provider
1	Kurzbericht_zur_Tiergesundheit_022022.pdf	YES	NO	2022-09-28 16:51:45	EUPH
2	Kurzbericht_zur_Tiergesundheit_032022_Korrektur.pdf	YES	NO	2022-09-28 16:53:22	EUPH
3	Kurzbericht_zur_Tiergesundheit_042021.pdf	YES	NO	2022-09-28 16:36:21	EUPH
4	Kurzbericht_zur_Tiergesundheit_042022.pdf	YES	NO	2022-09-28 16:54:37	EUPH
5	Kurzbericht_zur_Tiergesundheit_052021_Korrektur_18062021.pdf	YES	NO	2022-09-28 16:38:38	EUPH
6	Kurzbericht_zur_Tiergesundheit_052022.pdf	YES	NO	2022-09-28 16:56:11	EUPH
7	Kurzbericht_zur_Tiergesundheit_062021_1.pdf	YES	NO	2022-09-28 16:42:29	EUPH
8	Kurzbericht_zur_Tiergesundheit_062022.pdf	YES	NO	2022-09-28 16:57:43	EUPH
9	Kurzbericht_zur_Tiergesundheit_072021.pdf	YES	NO	2022-09-28 16:42:39	EUPH
10	Kurzbericht_zur_Tiergesundheit_072022.pdf	YES	NO	2022-09-28 16:59:15	EUPH
11	Kurzbericht_zur_Tiergesundheit_082021.pdf	YES	NO	2022-09-28 16:44:39	EUPH
12	Kurzbericht_zur_Tiergesundheit_082022.pdf	YES	NO	2022-09-28 17:00:33	EUPH
13	Kurzbericht_zur_Tiergesundheit_092020.pdf	YES	NO	2022-09-28 16:27:49	EUPH
14	Kurzbericht_zur_Tiergesundheit_092021.pdf	YES	NO	2022-09-28 16:46:27	EUPH
15	Kurzbericht_zur_Tiergesundheit_102021.pdf	YES	NO	2022-09-28 16:48:07	EUPH
16	Kurzbericht_zur_Tiergesundheit_112021.pdf	YES	NO	2022-09-28 16:49:13	EUPH
17	TGB_AT_2015_01.pdf	YES	NO	2020-11-24 23:53:34	EUPH
18	TGB_AT_2015_02.pdf	YES	NO	2020-11-24 23:53:22	EUPH
19	TGB_AT_2015_03.pdf	YES	NO	2020-11-24 23:53:18	EUPH
20	TGB_AT_2015_04.pdf	YES	NO	2020-11-24 23:53:12	EUPH

<b>Id</b>	<b>File</b>	<b>D</b>	<b>M</b>	<b>Arrival</b>	<b>Provider</b>
21	TGB_AT_2015_05.pdf	YES	NO	2020-11-24 23:53:08	EUPH
22	TGB_AT_2015_06.pdf	YES	NO	2020-11-24 23:53:04	EUPH
23	TGB_AT_2015_07.pdf	YES	NO	2020-11-24 23:52:54	EUPH
24	TGB_AT_2015_08.pdf	YES	NO	2020-11-24 23:52:50	EUPH
25	TGB_AT_2015_09.pdf	YES	NO	2020-11-24 23:52:46	EUPH
26	TGB_AT_2015_10.pdf	YES	NO	2020-11-24 23:52:40	EUPH
27	TGB_AT_2015_11.pdf	YES	NO	2020-11-24 23:52:36	EUPH
28	TGB_AT_2015_12.pdf	YES	NO	2020-11-24 23:52:30	EUPH
29	TGB_AT_2016_01.pdf	YES	NO	2020-11-24 23:45:16	EUPH
30	TGB_AT_2016_02.pdf	YES	NO	2020-11-24 23:45:10	EUPH
31	TGB_AT_2016_03.pdf	YES	NO	2020-11-24 23:45:06	EUPH
32	TGB_AT_2016_04.pdf	YES	NO	2020-11-24 23:48:30	EUPH
33	TGB_AT_2016_05.pdf	YES	NO	2020-11-24 23:44:54	EUPH
34	TGB_AT_2016_06.pdf	YES	NO	2020-11-24 23:44:48	EUPH
35	TGB_AT_2016_07.pdf	YES	NO	2020-11-24 23:44:44	EUPH
36	TGB_AT_2016_08.pdf	YES	NO	2020-11-24 23:44:40	EUPH
37	TGB_AT_2016_09.pdf	YES	NO	2020-11-24 23:44:34	EUPH
38	TGB_AT_2016_10.pdf	YES	NO	2020-11-24 23:44:30	EUPH
39	TGB_AT_2016_11.pdf	YES	NO	2020-11-24 23:44:22	EUPH
40	TGB_AT_2016_12.pdf	YES	NO	2020-11-24 23:44:18	EUPH
41	TGB_AT_2017_01.pdf	YES	NO	2020-11-24 23:33:02	EUPH
42	TGB_AT_2017_02.pdf	YES	NO	2020-11-24 23:33:08	EUPH
43	TGB_AT_2017_03.pdf	YES	NO	2020-11-24 23:33:12	EUPH
44	TGB_AT_2017_04.pdf	YES	NO	2020-11-24 23:33:18	EUPH
45	TGB_AT_2017_05.pdf	YES	NO	2020-11-24 23:33:24	EUPH
46	TGB_AT_2017_06.pdf	YES	NO	2020-11-24 23:33:30	EUPH
47	TGB_AT_2017_07.pdf	YES	NO	2020-11-24 23:33:36	EUPH
48	TGB_AT_2017_08.pdf	YES	NO	2020-11-24 23:33:40	EUPH
49	TGB_AT_2017_09.pdf	YES	NO	2020-11-24 23:33:50	EUPH
50	TGB_AT_2017_10.pdf	YES	NO	2020-11-24 23:33:56	EUPH
51	TGB_AT_2017_11.pdf	YES	NO	2020-11-24 23:34:02	EUPH
52	TGB_AT_2017_12.pdf	YES	NO	2020-11-24 23:32:52	EUPH
53	TGB_AT_2018_01.pdf	YES	NO	2020-11-24 23:26:18	EUPH
54	TGB_AT_2018_02.pdf	YES	NO	2020-11-24 23:26:24	EUPH
55	TGB_AT_2018_03.pdf	YES	NO	2020-11-24 23:26:28	EUPH
56	TGB_AT_2018_04.pdf	YES	NO	2020-11-24 23:26:34	EUPH
57	TGB_AT_2018_05.pdf	YES	NO	2020-11-24 23:26:40	EUPH
58	TGB_AT_2018_06.pdf	YES	NO	2020-11-24 23:26:46	EUPH
59	TGB_AT_2018_07.pdf	YES	NO	2020-11-24 23:26:52	EUPH
60	TGB_AT_2018_08.pdf	YES	NO	2020-11-24 23:26:58	EUPH



Id	File	D	M	Arrival	Provider
61	TGB_AT_2018_09.pdf	YES	NO	2020-11-24 23:27:04	EUPH
62	TGB_AT_2018_10.pdf	YES	NO	2020-11-24 23:27:10	EUPH
63	TGB_AT_2018_11.pdf	YES	NO	2020-11-24 23:27:14	EUPH
64	TGB_AT_2018_12.pdf	YES	NO	2020-11-24 23:26:12	EUPH
65	TGB_AT_2019_01.pdf	YES	NO	2020-11-24 23:18:46	EUPH
66	TGB_AT_2019_03.pdf	YES	NO	2020-11-24 23:20:20	EUPH
67	TGB_AT_2019_04.pdf	YES	NO	2020-11-24 23:20:12	EUPH
68	TGB_AT_2019_05.pdf	YES	NO	2020-11-24 23:20:08	EUPH
69	TGB_AT_2019_06.pdf	YES	NO	2020-11-24 23:20:00	EUPH
70	TGB_AT_2019_07.pdf	YES	NO	2020-11-24 23:19:54	EUPH
71	TGB_AT_2019_08.pdf	YES	NO	2020-11-24 23:19:48	EUPH
72	TGB_AT_2019_09.pdf	YES	NO	2020-11-24 23:19:42	EUPH
73	TGB_AT_2019_10.pdf	YES	NO	2020-11-24 23:19:32	EUPH
74	TGB_AT_2019_11.pdf	YES	NO	2020-11-24 23:19:26	EUPH
75	TGB_AT_2020_01.xlsx	YES	NO	2022-09-28 14:17:16	EUPH
76	TGB_AT_2020_02.xlsx	YES	NO	2022-09-28 14:15:20	EUPH
77	TGB_AT_2020_03.xlsx	YES	NO	2022-09-28 14:17:27	EUPH
78	vetcases_vetcaseat22_PREP_MR_220929.xlsx	YES	NO	2022-09-29 09:26:39	EUPH
79	Belgium - Data AFB and EFB.xlsx	YES	YES	2022-09-28 15:43:30	EUPH

## 5.2 Data Preparation

Raw data from BMSGPK was, if necessary, converted to a Microsoft® Excel® Document (\*.xlsx) using Adobe Acrobat Reader DC (Adobe, Version 2022.002.20212) rearranged and further processed with Excel (Microsoft Corporation, version 16.0.15601.20148). Data from FAVV-AFSCA was inserted manually into Excel. Data was then exported from Excel to a CSV format (coding: UTF-8) and subsequently imported for profiling into a SQL database (MariaDB foundation, Server-Version 10.4.24) running in a XAMPP environment (BitRock, version 3.3.0). Data was exported from the MySQL database to CSV format using windows-1252 coding.

## 5.3 Data Validation

None

## 5.4 Data Analysis

None



## 6 Data Description

*Table 2. Summary of tables belonging to the dataset. Row identifier (Id); Unique identifier of the table (Table); Unique identifier of the provider (Provider); concise description of the table (Description).*

Id	Table	Provider	Description
1	<i>Kvg</i>	EUPH	Data in this table was obtained from the Consumer Health Communication Platform (Kommunikationsplattform Verbrauchergesundheit, KVG) provided by the Austrian Federal Ministry of Social Affairs, Health, Care and Consumer Protection (Bundesministerium für Soziales, Gesundheit, Pflege und Konsumentenschutz, BMSGPK). It which contains information on food and consumer protection as well as animal health and animal welfare, among which outbreaks of notifiable honey bee diseases from 2015 to 2020 in Austria (AT).
2	<i>Vetcaseat</i>	EUPH	Data in this table was obtained from the Consumer Health Communication Platform (Kommunikationsplattform Verbrauchergesundheit, KVG) provided by the Austrian Federal Ministry of Social Affairs, Health, Care and Consumer Protection (Bundesministerium für Soziales, Gesundheit, Pflege und Konsumentenschutz, BMSGPK). It contains information on food and consumer protection as well as animal health and animal welfare, among which outbreaks of notifiable honey bee diseases from 2015 to 2022 in Austria (AT).
3	<i>Vetcasebe</i>	EUPH	Data in this table was obtained from the Belgian Federal Agency for the Safety of the Food Chain (Federaal Agentschap voor de veiligheid van de voedselketen - Agence fédérale pour la sécurité de la chaîne alimentaire, FAVV-AFSCA), which is responsible for the assessment and management of risks that may be harmful to the health of consumers as well as the health of animals and plants. It provides outbreaks of notifiable honey bee diseases from 2006 to 2022 in Belgium (BE).
4	<i>Vetcaseat22</i>	EUPH	Data in this table was obtained from the Styrian Beekeepers Association (Steirischer Landesverband für Bienenzucht, StLVB), which is the biggest beekeeping association in the region of Styria. It contains outbreaks of American foulbrood from 2000 to 2022 in Styria (AT22).
5	<i>Vetcase</i>	EUPH	Data in this table was merged from tables <i>vetcaseat</i> and <i>vetcasebe</i> .
6	<i>References</i>	EUPH	The table contains references to sources (books, scientific journals, technical journals, websites) from which data in this dataset was obtained.

*Table 3. Standardised metadata of the dataset. Row identifier (Id); parameter (Parameter); content of the parameter (Content).*

Id	Parameter	Content
1	UID	vetcases
2	Type	Files
3	Publishing date	2023-06-13
4	Description	This dataset contains data from various sources on the outbreak of notifiable diseases reported for honey bees ( <i>Apis mellifera</i> L.) in Belgium and Austria from 2000 to 2022.

## 6.1 EUPH

Table 4. Standardised metadata of the data provider. Row number (Id); reported parameter (Parameter); content of the parameter (Content).

Id	Parameter	Content
1	UID	euph
2	Name	EU Pollinator Hub
3	URL	http://pollinatorhub.eu
4	Acronym	EUPH
5	Address	n.a.
6	E-mail	office@pollinatorhub.eu
7	Phone number	n.a.
8	Description	The EU Pollinator Hub (EUPH) is a data hub related to pollinators, which is provided by the European Food Safety Authority (EFSA).

### 6.1.1 Kvg

Table 5. Standardised metadata of the table. Row identifier (Id); parameter (Parameter); content of the parameter (Content).

Id	Parameter	Content
1	UID	kvg
2	Created	2023-06-13 16:14:31
3	Licensing	© Bundesministerium für Soziales, Gesundheit, Pflege und Konsumentenschutz (BMSGPK). Die auf dieser Website veröffentlichten Beiträge sind urheberrechtlich geschützt. Alle Rechte bleiben vorbehalten. Die Wiedergabe für nicht kommerzielle Zwecke ist mit Quellenangabe gestattet (Quelle: BMSGPK). Für die kommerzielle Verwendung bedarf es einer Genehmigung. Für die Nutzung des Logos des BMSGPK muss ebenfalls eine gesonderte Genehmigung eingeholt werden.
4	Description	Data in this table was obtained from the Consumer Health Communication Platform (Kommunikationsplattform Verbrauchergesundheit, KVG) provided by the Austrian Federal Ministry of Social Affairs, Health, Care and Consumer Protection (Bundesministerium für Soziales, Gesundheit, Pflege und Konsumentenschutz, BMSGPK). It contains information on food and consumer protection as well as animal health and animal welfare, among which outbreaks of notifiable honey bee diseases from 2015 to 2020 in Austria (AT).

The table contains 23.994 records on 525 notified outbreaks (based on the number of distinct entities in column *casenumber*) of the notifiable honey bee disease *American Foulbrood* in a total of 70 districts from 2015 to 2020 in Austria. The following parameters are reported: number of hives notified in the quarantine area at beginning of the outbreak (*Susceptible livestock at start of outbreak*); number of hives notified in the quarantine area either at the end of the reporting period or at the end of the outbreak (*Susceptible livestock at end of outbreak*); cumulative number of confirmed cases, *i.e.* affected beehives with confirmed clinical symptoms, associated with the case number at the end of each reporting period (*Cases*); cumulative number of hives associated with the case number that were dead by the end of each reporting period (*Dead*); cumulative number of hives associated with the case number that were killed by the end of each reporting period (*Killed*); cumulative number of hives associated with the case number that were cured by the end of each reporting period (*Cured*). Reporting of cases in this form was discontinued after March 2020. Reports after March 2020 were therefore omitted. Cases can extend over several calendar years. Notified outbreaks

of honey bee diseases for Austria were obtained from KVG provided by BMSGPK (BMSGPK, 2015; BMSGPK, 2016; BMSGPK, 2017; BMSGPK, 2018; BMSGPK, 2019; BMSGPK, 2020). The data source for each record is referenced in column *sourceid*.

#### 6.1.1.1 Table structure

- Column *vetcases.kvg.districtcode* links to *countries.atbezirk.districtcode*
- Column *vetcases.kvg.sourceid* links to *references.id*

*Table 6. Description of the table. Row identifier (Id); column name (Name); data format (Format); minimum and maximum length of characters (Length); column may contain NULL values (NULL); description of the column (Description).*

Id	Name	Format	Length	NULL	Description
1	id	bigint	1-5	NO	Identifier of the record.
2	year	varchar	4	NO	Reporting period (calendar year).
3	month	int	1-2	NO	Reporting period (calendar month).
4	casenumber	varchar	15	NO	Case number adopted by BMSGPK.
5	disease	varchar	18	NO	Name of the disease.
6	item	varchar	13-42	NO	Description of the reported item.
7	datestart	date	10	NO	Date of establishment of a quarantine area. Official start of outbreak.
8	dateend	date	10	YES	Date of lifting of a quarantine area. Official end of outbreak.
9	districtcode	int	3	NO	Official code of the district (Politischer Bezirk) in which the notified outbreak occurred.
10	unit	varchar	6	NO	Unit in which the value is reported.
11	value	double	1-3	YES	Reported value.
12	annotation	text	0-57	YES	Detailed annotation to the value.
13	sourceid	bigint	1-2	NO	Reference to the data source.

#### 6.1.1.2 Table content

*Table 7. Content analysis of the table. Row identifier (Id); column name (Name); average (Avg); minimum (Min), maximum (Max), range (Range); coefficient of variation (CV); number and percentage (between brackets) of all values containing NULL (NULL), zero (0), blanks (Blank) or of distinct values, including NULL, 0 and blank (Distinct).*

Id	Name	Avg	Min	Max	Range	CV	NULL	Zero	Blank	Distinct
1	id	12157.5	1	24378	24377	58.1	0 (0.0%)	0 (0.0%)	0 (0.0%)	23994 (100.0%)
2	year	2016.8	2015	2020	5	0.1	0 (0.0%)	0 (0.0%)	0 (0.0%)	6 (0.0%)
3	month	65	1	12	11	49.4	0 (0.0%)	0 (0.0%)	0 (0.0%)	12 (0.1%)
4	casenumber	NULL	TKH-2012-000161	TKH-2020-000052	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	525 (2.2%)
5	disease	NULL	American Foulbrood	American Foulbrood	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	1 (0.0%)
6	item	NULL	Cured colonies	Susceptible livestock...	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	6 (0.0%)
7	datestart	NULL	2012-03-20	2020-03-30	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	344 (1.4%)
8	dateend	NULL	2015-01-15	2019-11-25	NULL	NULL	20760 (86.5%)	0 (0.0%)	0 (0.0%)	220 (0.9%)
9	districtcode	489.9	106	900	794	35.2	0 (0.0%)	0 (0.0%)	0 (0.0%)	70 (0.3%)
10	unit	NULL	number	number	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	1 (0.0%)

11	value	25	0	113	113	252.2	0 (0.0%)	14998 (62.5%)	0 (0.0%)	46 (0.2%)
12	annotation	NULL		Corrected from 30000...	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	4 (0.0%)
13	sourceid	319	1	61	60	60.7	0 (0.0%)	0 (0.0%)	0 (0.0%)	61 (0.3%)

#### 6.1.1.3 Changes made to preparatory file

- In column id {11878} value {30000} was corrected to 3 by Michael Rubinigg on 05.07.2021. Reason: value obviously wrong, replaced by the most plausible real value.
- In column id {11874} value {10000} was corrected to 1 by Michael Rubinigg on 05.07.2021. Reason: value obviously wrong, replaced by the most plausible real value.
- In column id {11868} value {10000} was corrected to 1 by Michael Rubinigg on 05.07.2021. Reason: value obviously wrong, replaced by the most plausible real value.

#### 6.1.1.4 Changes made to data in table

None

#### 6.1.1.5 Unresolved issues

None

### 6.1.2 Vetcaseat

Table 8. Standardised metadata of the table. Row identifier (*Id*); parameter (*Parameter*); content of the parameter (*Content*).

Id	Parameter	Content
1	UID	vetcase
2	Created	2023-06-13 16:14:31
3	Licensing	© Bundesministerium für Soziales, Gesundheit, Pflege und Konsumentenschutz (BMSGPK). Die auf dieser Website veröffentlichten Beiträge sind urheberrechtlich geschützt. Alle Rechte bleiben vorbehalten. Die Wiedergabe für nicht kommerzielle Zwecke ist mit Quellenangabe gestattet (Quelle: BMSGPK). Für die kommerzielle Verwendung bedarf es einer Genehmigung. Für die Nutzung des Logos des BMSGPK muss ebenfalls eine gesonderte Genehmigung eingeholt werden.
4	Description	Data in this table was obtained from the Consumer Health Communication Platform (Kommunikationsplattform Verbrauchergesundheit, KVG) provided by the Austrian Federal Ministry of Social Affairs, Health, Care and Consumer Protection (Bundesministerium für Soziales, Gesundheit, Pflege und Konsumentenschutz, BMSGPK). It reports the number of notified outbreaks (on an apiary basis) of notifiable honey bee diseases per district (Politischer Bezirk) or NUTS2 region (if district is NULL) and month from 2015 to 2022 in Austria (AT).

The table contains 513 records of notified outbreaks of 2 different diseases (American Foulbrood, AFB; Varroosis in the case of imminent or actual death of at least 30% of the colonies in an apiary, Varroosis) for Austria from January 2015 to August 2022. From January 2015 to March 2020 data was obtained from file *kvg.csv* and notified outbreaks (on an apiary basis) per district (Politischer Bezirk) and month are reported (BMSGPK, 2015; BMSGPK, 2016; BMSGPK, 2017; BMSGPK, 2018; BMSGPK, 2019; BMSGPK, 2020). From September 2020, the sum of outbreaks per NUTS2 region and month are reported (BMSGPK, 2021; BMSGPK, 2022). A total of 511 outbreaks of AFB and 2 outbreaks of Varroosis were reported. The data source for each record is referenced in column *sourceid*.

#### 6.1.2.1 Table structure

- Column *vetcases.vetcaseat.animalspecies* links to [https://www.gbif.org/species/\[animalspecies\]](https://www.gbif.org/species/[animalspecies])
- Column *vetcases.vetcaseat.country* links to *countries.iso3166\_1\_2020.alpha2code*
- Column *vetcases.vetcaseat.nuts* links to *nuts.nuts21.nuts*
- Column *vetcases.vetcaseat.districtcode* links to *countries.atbezirk.districtcode*
- Column *vetcases.vetcaseat.sourceid* links to *references.id*

Table 9. Description of the table. Row identifier (*Id*); column name (*Name*); data format (*Format*); minimum and maximum length of characters (*Length*); column may contain NULL values (*NULL*); description of the column (*Description*).

Id	Name	Format	Length	NULL	Description
1	id	bigint	1-3	NO	Identifier of the record.
2	year	int	4	NO	Reporting period (calendar year).
3	month	int	1-2	YES	Reporting period (calendar month).
4	casenumber	varchar	15	YES	Case number adopted by BMSGPK.
5	disease	varchar	18-94	NO	Name of the disease.

6	animalspecies	bigint	7	NO	The GBIF Taxon ID of the animal species concerned by the notified outbreak. It is the number following the URL <a href="https://www.gbif.org/species/">https://www.gbif.org/species/</a> , which points to a taxonomic rank.
7	datestart	date	10	YES	Date of establishment of a quarantine area. Official start of outbreak.
8	dateend	date	10	YES	Date of lifting of a quarantine area. Official end of outbreak.
9	country	varchar	3	NO	ISO 3166-1 alpha-3 code of the country in which the notified outbreak occurred.
10	nuts	varchar	4	YES	Nuts code of the geographic entity in which the notified outbreak occurred.
11	districtcode	int	3	YES	Official code of the district ( <i>Politischer Bezirk</i> ) in which the notified outbreak occurred.
12	unit	varchar	6	YES	Unit in which the value is reported.
13	value	int	1-2	YES	Number of notified outbreaks (on an apiary basis) per district ( <i>Politischer Bezirk</i> ) or NUTS2 region (if district is NULL) and month.
14	annotation	text	\N	YES	Detailed annotation to the value.
15	sourceid	bigint	1-2	NO	Reference to the data source.

### 6.1.2.2 Table content

*Table 10. Content analysis of the table. Row identifier (Id); column name (Name); average (Avg); minimum (Min), maximum (Max), range (Range); coefficient of variation (CV); number and percentage (between brackets) of all values containing NULL (NULL), zero (0), blanks (Blank) or of distinct values, including NULL, 0 and blank (Distinct).*

Id	Name	Avg	Min	Max	Range	CV	NULL	Zero	Blank	Distinct
1	id	257.0	1	513	512	57.6	0 (0.0%)	0 (0.0%)	0 (0.0%)	513 (100.0%)
2	year	2017.3	2015	2022	7	0.1	0 (0.0%)	0 (0.0%)	0 (0.0%)	8 (1.6%)
3	month	6.3	1	12	11	30.9	0 (0.0%)	0 (0.0%)	0 (0.0%)	12 (2.3%)
4	casenumber	NULL	TKH-2014-000443	TKH-2020-000052	NULL	NULL	53 (10.3%)	0 (0.0%)	0 (0.0%)	460 (89.7%)
5	disease	NULL	American Foulbrood	Varroosis in the cas...	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	2 (0.4%)
6	animalspecies	1341976.0	1341976	1341976	0	0	0 (0.0%)	0 (0.0%)	0 (0.0%)	1 (0.2%)
7	datestart	NULL	2015-01-07	2020-03-30	NULL	NULL	53 (10.3%)	0 (0.0%)	0 (0.0%)	297 (57.9%)
8	dateend	NULL	2015-04-08	2019-11-25	NULL	NULL	157 (30.6%)	0 (0.0%)	0 (0.0%)	192 (37.4%)
9	country	NULL	AUT	AUT	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	1 (0.2%)
10	nuts	NULL	AT11	AT34	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	9 (1.8%)
11	districtcode	489.6	106	900	794	34.4	53 (10.3%)	0 (0.0%)	0 (0.0%)	67 (13.1%)
12	unit	NULL	number	number	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	1 (0.2%)
13	value	1.1	1	11	10	72.6	0 (0.0%)	0 (0.0%)	0 (0.0%)	8 (1.6%)
14	annotation	NULL	NULL	NULL	NULL	NULL	513 (100.0%)	0 (0.0%)	0 (0.0%)	0 (0.0%)
15	sourceid	46.8	1	80	79	37.9	0 (0.0%)	0 (0.0%)	0 (0.0%)	52 (10.1%)

### 6.1.2.3 Changes made to preparatory file

None

### 6.1.2.4 Changes made to data in table

None



#### 6.1.2.5 Unresolved issues

None

## 6.1.3 Vetcasebe

Table 11. Standardised metadata of the table. Row identifier (Id); parameter (Parameter); content of the parameter (Content).

Id	Parameter	Content
1	UID	vetcasebe
2	Created	2023-06-13 16:14:31
3	Licensing	Seul le droit de reproduire des informations à des fins non commerciales est autorisé, moyennant mention de la source. Il pourra être demandé à toute personne physique ou morale qui ne respecte pas les prescriptions figurant ci-dessus d'indemniser intégralement l'administration fédérale belge pour les coûts causés par l'usage impropre.
4	Description	Data in this table was obtained from the Belgian Federal Agency for the Safety of the Food Chain ( <i>Federaal Agentschap voor de veiligheid van de voedselketen</i> - <i>Agence fédérale pour la sécurité de la chaîne alimentaire</i> , FAVV-AFSCA), which is responsible for the assessment and management of risks that may be harmful to the health of consumers as well as the health of animals and plants. It provides outbreaks of notifiable honey bee diseases from 2006 to 2022 in Belgium (BE).

The table contains 84 records with notified outbreaks of 2 different notifiable diseases (American Foulbrood, AFB; European Foulbrood, EFB) for Belgium from January 2006 to July 2022 (49 records) (AFSCA, n.d.). From 2006 to 2017 only the annual sum of notified outbreaks in the whole country are reported (which may also be 0 if no outbreak was notified to the authorities). From 2018, each notified outbreak in an apiary is reported. Notified outbreaks of European foulbrood in Belgium are available from June 2014 to August 2022. Each notified outbreak in an apiary is reported. The data source for each record is referenced in column *sourceid*.

## 6.1.3.1 Table structure

- Column *vetcases.vetcasebe.animalspecies* links to [https://www.gbif.org/species/\[animalspecies\]](https://www.gbif.org/species/[animalspecies])
- Column *vetcases.vetcasebe.country* links to *countries.iso3166\_1\_2020.alpha2code*
- Column *vetcases.vetcasebe.nuts* links to *nuts.nuts21.nuts*
- Column *vetcases.vetcasebe.postcode* links to *postcodes.postcode22.postcode*
- Column *vetcases.vetcasebe.sourceid* links to *references.id*

Table 12. Description of the table. Row identifier (Id); column name (Name); data format (Format); minimum and maximum length of characters (Length); column may contain NULL values (NULL); description of the column (Description).

Id	Name	Format	Length	NULL	Description
1	id	bigint	3	NO	Identifier of the record.
2	year	int	4	NO	Reporting period (calendar year).
3	month	int	1-2	YES	Reporting period (calendar month).
4	disease	varchar	18	NO	Name of the disease.
5	animalspecies	bigint	7	NO	The GBIF Taxon ID of the animal species concerned by the notified outbreak. It is the number following the URL <a href="https://www.gbif.org/species/">https://www.gbif.org/species/</a> , which points to a taxonomic rank.
6	datestart	date	10	YES	Date of establishment of a quarantine area. Official start of outbreak.
7	dateend	date	10	YES	Date of lifting of a quarantine area. Official end of outbreak.
8	country	varchar	3	NO	ISO 3166-1 alpha-3 code of the country in which the notified outbreak occurred.
9	nuts	varchar	2-5	YES	Nuts code of the geographic entity in which the notified outbreak occurred.

10	postcode	varchar	4	YES	Postcode of the location in which the notified outbreak occurred.
11	unit	varchar	6	YES	Unit in which the value is reported.
12	value	int	1-2	YES	Number of notified outbreaks (on an apiary basis) per postcode or NUTS region (if postcode is NULL) and month or year (if month is NULL).
13	annotation	text	\N	YES	Detailed annotation to the value.
14	sourceid	bigint	2	NO	Reference to the data source.

### 6.1.3.2 Table content

Table 13. Content analysis of the table. Row identifier (Id); column name (Name); average (Avg); minimum (Min), maximum (Max), range (Range); coefficient of variation (CV); number and percentage (between brackets) of all values containing NULL (NULL), zero (0), blanks (Blank) or of distinct values, including NULL, 0 and blank (Distinct).

Id	Name	Avg	Min	Max	Range	CV	NULL	Zero	Blank	Distinct
1	id	555.5	514	597	83	4.4	0 (0.0%)	0 (0.0%)	0 (0.0%)	84 (100.0%)
2	year	2018.1	2006	2022	16	0.2	0 (0.0%)	0 (0.0%)	0 (0.0%)	17 (20.2%)
3	month	6.8	4	11	7	22.6	12 (14.3%)	0 (0.0%)	0 (0.0%)	7 (8.3%)
4	disease	NULL	American Foulbrood	European Foulbrood	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	2 (2.4%)
5	animalspecies	1341976.0	1341976	1341976	0	0	0 (0.0%)	0 (0.0%)	0 (0.0%)	1 (1.2%)
6	datestart	NULL	2014-06-05	2022-08-30	NULL	NULL	12 (14.3%)	0 (0.0%)	0 (0.0%)	58 (69.0%)
7	dateend	NULL	2014-08-06	2022-11-26	NULL	NULL	15 (17.9%)	0 (0.0%)	0 (0.0%)	26 (31.0%)
8	country	NULL	BEL	BEL	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	1 (1.2%)
9	nuts	NULL	BE	BE353	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	19 (22.6%)
10	postcode	6327.6	1549	9255	7706	27	12 (14.3%)	0 (0.0%)	0 (0.0%)	33 (39.3%)
11	unit	NULL	number	number	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	1 (1.2%)
12	value	1.8	0	36	36	231.9	0 (0.0%)	3 (3.6%)	0 (0.0%)	9 (10.7%)
13	annotation	NULL	NULL	NULL	NULL	NULL	84 (100.0%)	0 (0.0%)	0 (0.0%)	0 (0.0%)
14	sourceid	78.1	78	79	1	0.4	0 (0.0%)	0 (0.0%)	0 (0.0%)	2 (2.4%)

### 6.1.3.3 Changes made to preparatory file

None

### 6.1.3.4 Changes made to data in table

None

### 6.1.3.5 Unresolved issues

None

## 6.1.4 Vetcaseat22

Table 14. Standardised metadata of the table. Row identifier (Id); parameter (Parameter); content of the parameter (Content).

Id	Parameter	Content
1	UID	vetcasesat22
2	Created	2023-06-13 16:14:31
3	Licensing	NC
4	Description	Data in this table was obtained from the Styrian Beekeepers Association (Steirischer Landesverband für Bienenzucht, StLVB), which is the biggest beekeeping association in the region of Styria. It contains outbreaks of American foulbrood from 2000 to 2022 in Styria (AT22).

The table contains 468 records on notified outbreaks of American foulbrood in the Austrian region of Styria (Nuts AT22) obtained from administrative rulings and regulations released by the competent veterinary authorities and forwarded to the Styrian Beekeepers Association (StLVB). Note that the number of notified outbreaks given in the monthly veterinary reports (as reported in file *vetcase.csv*) is usually higher than the number of notified outbreaks retrieved from the documents received by the beekeeper association (as reported in file *vetcasesat22.csv*). This might either be due to the fact that not all documents regarding notified outbreaks of American foulbrood were forwarded to the association and correctly archived there or to the fact that the number of notified outbreaks were reported differently by local veterinary authorities and by the BMSGPK. Cases of notified outbreaks can extend over several calendar years, either because the case could not be resolved within one calendar year or because the veterinary authority forgot to officially close the case. To assess the benefit of a location-based risk assessment, this file was nevertheless included in the dataset. Ordinances issued by district administrative authorities (*Verordnung*) are publicly announced. The data contained in the ordinances are therefor considered public domain.

## 6.1.4.1 Table structure

- Column *vetcaseat22.vetcaseat.municipalitycode* links to *countries.atgemeinde.municipalitycode*

Table 15. Description of the table. Row identifier (Id); column name (Name); data format (Format); minimum and maximum length of characters (Length); column may contain NULL values (NULL); description of the column (Description).

Id	Name	Format	Length	NULL	Description
1	id	bigint	1-3	NO	Identifier of the record.
2	disease	varchar	18	NO	Name of the disease.
3	municipalitycode	int	5	NO	Official code of the municipality (Gemeindekennziffer) in which the notified outbreak occurred.
4	wgs84e	decimal	9	NO	Latitude of the position of the affected apiary in WGS 84 format.
5	wgs84n	decimal	9	NO	Longitude of the position of the affected apiary in WGS 84 format.
6	bedatestart	date	10	YES	Date of the administrative ruling (Bescheid) by which the apiary affected by a notifiable disease is put into quarantine.
7	begzstart	varchar	8-50	YES	Reference number of the administrative ruling (Bescheid) by which the apiary affected by a notifiable disease is put into quarantine.

8	bedateend	date	10	YES	Date of the administrative ruling (Bescheid) by which the apiary affected by a notifiable disease is released from quarantine.
9	begzend	varchar	8-36	YES	Reference number of the administrative ruling (Bescheid) by which the apiary affected by a notifiable disease is released from quarantine.
10	vodatestart	date	10	YES	Date of the regulation (Verordnung) establishing a quarantine zone around an apiary affected by a notifiable disease.
11	vogzstart	varchar	10-50	YES	Reference number of the regulation (Verordnung) establishing a quarantine zone around an apiary affected by a notifiable disease.
12	vodateend	date	10	YES	Date of the regulation (Verordnung) revoking a quarantine zone around an apiary affected by a notifiable disease.
13	vogzend	varchar	10-37	YES	Reference number of the regulation (Verordnung) revoking a quarantine zone around an apiary affected by a notifiable disease.
14	annotation	text	\N	YES	Detailed annotation to the record.

#### 6.1.4.2 Table content

Table 16. Content analysis of the table. Row identifier (Id); column name (Name); average (Avg); minimum (Min), maximum (Max), range (Range); coefficient of variation (CV); number and percentage (between brackets) of all values containing NULL (NULL), zero (0), blanks (Blank) or of distinct values, including NULL, 0 and blank (Distinct).

Id	Name	Avg	Min	Max	Range	CV	NULL	Zero	Blank	Distinct
1	id	234.5	1	469	468	57.6	0 (0.0%)	0 (0.0%)	0 (0.0%)	468 (100.0%)
2	disease	NULL	American Foulbrood	American Foulbrood	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	1 (0.2%)
3	districtcode	61541.0	60101	62390	2289	0.9	0 (0.0%)	0 (0.0%)	0 (0.0%)	137 (29.3%)
4	wgs84e	15.1382963	13.827600	16.038601	2.2110010	4.3	0 (0.0%)	0 (0.0%)	0 (0.0%)	441 (94.2%)
5	wgs84n	47.2603699	46.623699	47.723618	1.0999190	0.5	0 (0.0%)	0 (0.0%)	0 (0.0%)	431 (92.1%)
6	bedatestart	NULL	2000-05-17	2022-07-05	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	317 (67.7%)
7	begzstart	NULL	12.2.2.24-2011	not available	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	331 (70.7%)
8	bedateend	NULL	2000-10-02	2022-07-22	NULL	NULL	21 (4.5%)	0 (0.0%)	0 (0.0%)	254 (54.3%)
9	begzend	NULL	12.2.2.24-2011	not available	NULL	NULL	21 (4.5%)	0 (0.0%)	0 (0.0%)	314 (67.1%)
10	vodatestart	NULL	2001-07-18	2022-07-12	NULL	NULL	213 (45.5%)	0 (0.0%)	0 (0.0%)	181 (38.7%)
11	vogzstart	NULL	18 B 4/2001	not available	NULL	NULL	213 (45.5%)	0 (0.0%)	0 (0.0%)	223 (47.6%)
12	vodateend	NULL	2002-05-28	2022-07-22	NULL	NULL	230 (49.1%)	0 (0.0%)	0 (0.0%)	140 (29.9%)
13	vogzend	NULL	18.2 B 17-2013/7	not available	NULL	NULL	228 (48.7%)	0 (0.0%)	0 (0.0%)	149 (31.8%)
14	annotation	NULL	NULL	NULL	NULL	NULL	468 (100.0%)	0 (0.0%)	0 (0.0%)	0 (0.0%)

#### 6.1.4.3 Changes made to preparatory file

None

#### 6.1.4.4 Changes made to data in table

None

#### 6.1.4.5 Unresolved issues

None

### 6.1.5 Vetcase

Table 17. Standardised metadata of the table. Row identifier (Id); parameter (Parameter); content of the parameter (Content).

Id	Parameter	Content
1	UID	vetcase
2	Created	2023-06-13 16:14:31
3	Licensing	EUPH
4	Published	n.a.
5	Description	Data in this table was merged from tables <i>vetcaseat</i> and <i>vetcasebe</i> .

The table contains 597 records with notified outbreaks of 3 different diseases (American Foulbrood, AFB; European Foulbrood, EFB; Varroosis) for 2 countries (Austria, Belgium).

#### 6.1.5.1 Table structure

- Column *vetcases.vetcaseat.animalspecies* links to [https://www.gbif.org/species/\[animalspecies\]](https://www.gbif.org/species/[animalspecies])
- Column *vetcases.vetcaseat.country* links to *countries.iso3166\_1\_2020.alpha2code*
- Column *vetcases.vetcaseat.nuts* links to *nuts.nuts21.nuts*
- Column *vetcases.vetcaseat.districtcode* links to *countries.atbezirk.districtcode*
- Column *vetcases.vetcasebe.postcode* links to *postcodes.postcode22.postcode*
- Column *vetcases.vetcaseat.sourceid* links to *references.id*

Table 18. Description of the table. Row identifier (Id); column name (Name); data format (Format); minimum and maximum length of characters (Length); column may contain NULL values (NULL); description of the column (Description).

Id	Name	Format	Length	NULL	Description
1	id	bigint	1-3	NO	Identifier of the record.
2	year	int	4	NO	Reporting period (calendar year).
3	month	int	1-2	YES	Reporting period (calendar month).
4	casenumber	varchar	15	YES	Case number adopted by BMSGPK.
5	disease	varchar	18-94	NO	Name of the disease.
6	animalspecies	bigint	7	NO	The GBIF Taxon ID of the animal species concerned by the notified outbreak. It is the number following the URL <a href="https://www.gbif.org/species/">https://www.gbif.org/species/</a> , which points to a taxonomic rank.
7	datestart	date	10	YES	Date of establishment of a quarantine area. Official start of outbreak.
8	dateend	date	10	YES	Date of lifting of a quarantine area. Official end of outbreak.
9	country	varchar	3	NO	ISO 3166-1 alpha-3 code of the country in which the notified outbreak occurred.
10	nuts	varchar	2-5	YES	Nuts code of the geographic entity in which the notified outbreak occurred.
11	districtcode	int	3	YES	Official code of the municipality (Gemeindekennziffer) in which the notified outbreak occurred.
12	postcode	varchar	4	YES	Postcode of the location in which the notified outbreak occurred.
13	unit	varchar	6	YES	Unit in which the value is reported.

14	value	int	1-2	YES	Number of notified outbreaks (on an apiary basis) per district ( <i>Politischer Bezirk</i> ) or postcode or NUTS region (if district or postcode is NULL) and month or year (if month is NULL).
15	annotation	text	\N	YES	Detailed annotation to the value.
16	sourceid	bigint	1-2	NO	Reference to the data source.

### 6.1.5.2 Table content

*Table 19. Content analysis of the table. Row identifier (Id); column name (Name); average (Avg); minimum (Min), maximum (Max), range (Range); coefficient of variation (CV); number and percentage (between brackets) of all values containing NULL (NULL), zero (0), blanks (Blank) or of distinct values, including NULL, 0 and blank (Distinct).*

Id	Name	Avg	Min	Max	Range	CV	NULL	Zero	Blank	Distinct
1	id	299.0	1	597	596	57.6	0 (0.0%)	0 (0.0%)	0 (0.0%)	597 (100.0%)
2	year	2017.4	2006	2022	16	0.1	0 (0.0%)	0 (0.0%)	0 (0.0%)	17 (2.8%)
3	month	6.4	1	12	11	29.8	12 (2.0%)	0 (0.0%)	0 (0.0%)	12 (2.0%)
4	casenumber	NULL	TKH-2014-000443	TKH-2020-000052	NULL	NULL	137 (22.9%)	0 (0.0%)	0 (0.0%)	460 (77.1%)
5	disease	NULL	American Foulbrood	Varroosis in the cas...	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	3 (0.5%)
6	animalspecies	1341976.0	1341976	1341976	0	0	0 (0.0%)	0 (0.0%)	0 (0.0%)	1 (0.2%)
7	datestart	NULL	2014-06-05	2022-08-30	NULL	NULL	65 (10.9%)	0 (0.0%)	0 (0.0%)	344 (57.6%)
8	dateend	NULL	2014-08-06	2022-11-26	NULL	NULL	172 (28.8%)	0 (0.0%)	0 (0.0%)	216 (36.2%)
9	country	NULL	AUT	BEL	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	2 (0.3%)
10	nuts	NULL	AT11	BE353	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	28 (4.7%)
11	districtcode	489.6	106	900	794	34.4	137 (22.9%)	0 (0.0%)	0 (0.0%)	67 (11.2%)
12	postcode	6327.6	1549	9255	7706	27	525 (87.9%)	0 (0.0%)	0 (0.0%)	33 (5.5%)
13	unit	NULL	number	number	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	1 (0.2%)
14	value	1.2	0	36	36	145.5	0 (0.0%)	3 (0.5%)	0 (0.0%)	11 (1.8%)
15	annotation	NULL	NULL	NULL	NULL	NULL	597 (100.0%)	0 (0.0%)	0 (0.0%)	0 (0.0%)
16	sourceid	51.2	1	80	79	38.5	0 (0.0%)	0 (0.0%)	0 (0.0%)	54 (9.0%)

### 6.1.5.3 Changes made to preparatory file

None

### 6.1.5.4 Changes made to data in table

None

### 6.1.5.5 Unresolved issues

None



### 6.1.6 References

Table 20. Standardised metadata of the file. Row identifier (*Id*); parameter (*Parameter*); content of the parameter (*Content*).

Id	Parameter	Content
1	UID	references
2	Created	2023-06-13 16:14:31
3	Licensing	EUPH
4	Description	The table contains references to sources (books, scientific journals, technical journals, websites) from which data in this dataset was obtained.

The table contains 80 records.

#### 6.1.6.1 Table structure

Table 21. Description of the table. Row identifier (*Id*); column name (*Name*); data format (*Format*); minimum and maximum length of characters (*Length*); column may contain NULL values (*NULL*); description of the column (*Description*).

Id	Name	Format	Length	NULL	Description
1	id	bigint(20) unsigned	1-2	NO	Identifier of the record.
2	format	varchar(32)	6	NO	Reference format.
3	reference	text	406-508	NO	Reference given in the format as defined in column <i>format</i> .

#### 6.1.6.2 Table content

Table 22. Content analysis of the table. Row identifier (*Id*); column name (*Name*); average (*Avg*); minimum (*Min*), maximum (*Max*), range (*Range*); coefficient of variation (*CV*); number and percentage (between brackets) of all values containing NULL (*NULL*), zero (*0*), blanks (*Blank*) or of distinct values, including NULL, 0 and blank (*Distinct*).

Id	Name	Avg	Min	Max	Range	CV	NULL	Zero	Blank	Distinct
1	id	40.5	1	80	79	57	0 (0.0%)	0 (0.0%)	0 (0.0%)	80 (100.0%)
2	format	NULL	BibTeX	BibTeX	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	1 (1.3%)
3	reference	NULL	@misc{agence_federa...	@techreport{bundesmi...	NULL	NULL	0 (0.0%)	0 (0.0%)	0 (0.0%)	80 (100.0%)

#### 6.1.6.3 Changes made to preparatory file

None

#### 6.1.6.4 Changes made to data in table

None

#### 6.1.6.5 Unresolved issues

None

## 7 References

- AFSCA. (kein Datum). *Santé animale – abeilles*. (Agence fédérale pour la sécurité de la chaîne alimentaire) Abgerufen am 28. 09 2022 von <https://www.favv-afscs.be/apiculture/santeanimale/>
- BMSGPK. (2015). *Tiergesundheitsbericht 2015*. (Bundesministerium für Soziales, Gesundheit, Pflege und Konsumentenschutz) Abgerufen am 24. 11 2020 von [https://www.verbrauchergesundheit.gv.at/tiere/krankheiten/tgb\\_adns/tgb15.html](https://www.verbrauchergesundheit.gv.at/tiere/krankheiten/tgb_adns/tgb15.html)
- BMSGPK. (2016). *Tiergesundheitsbericht 2016*. (Bundesministerium für Soziales, Gesundheit, Pflege und Konsumentenschutz) Abgerufen am 24. 11 2020 von [https://www.verbrauchergesundheit.gv.at/tiere/krankheiten/tgb\\_adns/tgb16.html](https://www.verbrauchergesundheit.gv.at/tiere/krankheiten/tgb_adns/tgb16.html)
- BMSGPK. (2017). *Tiergesundheitsbericht 2017*. (Bundesministerium für Soziales, Gesundheit, Pflege und Konsumentenschutz) Abgerufen am 24. 11 2020 von [https://www.verbrauchergesundheit.gv.at/tiere/krankheiten/tgb\\_adns/tgb17.html](https://www.verbrauchergesundheit.gv.at/tiere/krankheiten/tgb_adns/tgb17.html)
- BMSGPK. (2018). *Tiergesundheitsbericht 2018*. (Bundesministerium für Soziales, Gesundheit, Pflege und Konsumentenschutz) Abgerufen am 24. 11 2020 von [https://www.verbrauchergesundheit.gv.at/tiere/krankheiten/tgb\\_adns/tgb18.html](https://www.verbrauchergesundheit.gv.at/tiere/krankheiten/tgb_adns/tgb18.html)
- BMSGPK. (2019). *Tiergesundheitsbericht 2019*. (Bundesministerium für Soziales, Gesundheit, Pflege und Konsumentenschutz) Abgerufen am 24. 11 2020 von [https://www.verbrauchergesundheit.gv.at/tiere/krankheiten/tgb\\_adns/tgb19.html](https://www.verbrauchergesundheit.gv.at/tiere/krankheiten/tgb_adns/tgb19.html)
- BMSGPK. (2020). *Tiergesundheitsbericht 2020*. (Bundesministerium für Soziales, Gesundheit, Pflege und Konsumentenschutz) Abgerufen am 24. 11 2020 von [https://www.verbrauchergesundheit.gv.at/tiere/krankheiten/tgb\\_adns/tgb20.html](https://www.verbrauchergesundheit.gv.at/tiere/krankheiten/tgb_adns/tgb20.html)
- BMSGPK. (2021). *Kurzbericht zur Tiergesundheit 2021*. (Bundesministerium für Soziales, Gesundheit, Pflege und Konsumentenschutz) Abgerufen am 28. 09 2022 von [https://www.verbrauchergesundheit.gv.at/tiere/krankheiten/tgb\\_adns/15022021\\_1.html](https://www.verbrauchergesundheit.gv.at/tiere/krankheiten/tgb_adns/15022021_1.html)
- BMSGPK. (2022). *Kurzbericht zur Tiergesundheit 2022*. (Bundesministerium für Soziales, Gesundheit, Pflege und Konsumentenschutz) Abgerufen am 28. 09 2022 von [https://www.verbrauchergesundheit.gv.at/tiere/krankheiten/tgb\\_adns/15022022.html](https://www.verbrauchergesundheit.gv.at/tiere/krankheiten/tgb_adns/15022022.html)

## 8 Annexes

**There are no annexes in the current document.**