

**Supplementary Table 1: The available data of clinical characteristics and outcome in cases.**

Country and areas	Update date	Number of patients	Age	Gender	Ethnicity	Symptoms	Adenovirus positive	SARS-CoV-2 positive	Transplantation	Death
England	By May 16, 2022 <sup>[1]</sup>	144	Median age was 3 years (IQR = 2–4 years)	Female: 50%.	White ethnicity (113; 86.3%)	Jaundice (99; 68.8%), vomiting (83; 57.6%), pale stools (42.7%), diarrhea (43.1%), nausea (25.7%), abdominal pain (36.1%), lethargy (48.6%), fever (28.5%), and respiratory symptoms (18.1%).	91/122 (75%) 27/35 were type 41F	16/125 (12.8%)	/	0
	By June 17, 2022 <sup>[2]</sup>	187	Median age was 3 years (IQR = 2–5 years)	Female: 49%.	White ethnicity (142/187; 88.2%)	/	/	9.7%	9	0
Scotland	By April 12, 2022 <sup>[3]</sup>	13	Median age was 3.9 years (IQR = 3.6–4.6 years)	Female: 54% (7/13).	White Scottish ethnicity (100%)	Jaundice (8; 88.9%), abdominal pain (7; 77.8%), nausea and malaise (6; 66.7%), diarrhea or vomiting, and lethargy, but not fever (4/4; 100%).	5/11 (45.5%)	5/13 (38.5%)	1	0

	By June 13, 2022 <sup>[2]</sup>	32	/	/	/	/	/	/	/	/
UK	By June 17, 2022 <sup>[2]</sup>	260	/	/	/	/	156/251 (64.7%)	34/196 (17.3%)	12	0
Europe	By July 1, 2022 <sup>[4]</sup>	473	/	/	/	/	192/364 (52–7%) 3/8 were type 41F	PCR: 35/322 (10.9%); Serology: 39/61 (63.9%)	20	/
Alabama, United States	By February 2022 <sup>[5]</sup>	9	Median age was 2 years, 11 months (IQR = 1 year, 8 months to 5 years, 9 months)	Female: 78% (7/9).	White ethnicity (100%)	Vomiting (7; 77.8%), diarrhea (6; 66.7%), upper respiratory (3; 33.3%), scleral icterus (8; 88.9%), hepatomegaly (7; 77.8%), jaundice (6; 66.7%), and encephalopathy (1; 11.1%).	9/9 (100%) 5/5 were type 41F	0/9 (-)	2	0

The United States	By June 22, 2022 <sup>[6]</sup>	305 (PUIs*)	Median age was 2 years	Female: 50%.	/	/	-/252 (45%) 13/20 were type 41F	/	20	11
Japan	By June 23, 2022 <sup>[7]</sup>	62	Median age was 5 years (IQR = 2–10 years)	Female: 45% (28/62).	/	Fever >37.5°C (41/60; 68%), gastrointestinal symptoms (31/60; 52%), cough (17/60; 28%), jaundice (13/60; 22%), white stools (3/60; 5%), and impaired consciousness (3/60; 5%).	5/59 (8%)	5/58 (9%)	0	0

AST: Aspartate aminotransferase; ALT: Alanine aminotransferase; IQR: Interquartile range; PCR: Polymerase chain reaction; PUI: Patients under investigation; SARS-CoV-2: Severe acute respiratory syndrome.

Children aged <10 years with elevated (>500 U/L) AST or ALT who have an unknown etiology for their hepatitis (with or without any adenovirus testing results, irrespective of the results) since October 1, 2021.

\*Current PUI definition.

## References

1. UK Health Security Agency. Technical briefing: Investigation into acute hepatitis of unknown aetiology in children in England, Version 1.0. GOV-12265; May 2022. Available from: [https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment\\_data/file/1077027/acute-hepatitis-technical-briefing\\_3.pdf](https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/1077027/acute-hepatitis-technical-briefing_3.pdf). [Last accessed on 2022 May].
2. UK Health Security Agency. Investigation into acute hepatitis of unknown aetiology in children in England: Case update, 2022. Available from: <https://www.gov.uk/government/publications/acute-hepatitis-technical-briefing/investigation-into-acute-hepatitis-of-unknown-aetiology-in-children-in-england-case-update>. [Last accessed on 2022].
3. Marsh K, Tayler R, Pollock L, Roy K, Lakha F, Ho A, *et al*. Investigation into cases of hepatitis of unknown aetiology among young children, Scotland, 1 January 2022 to 12 April 2022. *Euro Surveill* 2022;27:2200318. doi: 10.2807/1560-7917.ES.2022.27.15.2200318.
4. ECDC. Joint ECDC-WHO regional office for Europe hepatitis of unknown origin in children surveillance bulletin, 1 July 2022. Available from: <https://cdn.ecdc.europa.eu/novhep-surveillance/>. [Last accessed on 2022 July 1].
5. Baker JM, Buchfellner M, Britt W, Sanchez V, Potter JL, Ingram LA, *et al*. Acute hepatitis and adenovirus infection among children – Alabama, October 2021-February 2022. *MMWR Morb Mortal Wkly Rep* 2022;71:638–640. doi: 10.15585/mmwr.mm7118e1.
6. NCIRD. Technical report: Acute hepatitis of unknown cause, 2022. Available from: <https://www.cdc.gov/ncird/investigation/hepatitis-unknown-cause/technical-report.html>. [Last accessed on 2022]
7. Japanese National Institute of Infectious Diseases report, 2022. Available from: <https://www.niid.go.jp/niid/ja/jissekijpn/11255-fetp-3.html>. [Last accessed on 2022].