



## Case report

## An infected cyst due to a congenital pulmonary airway malformation

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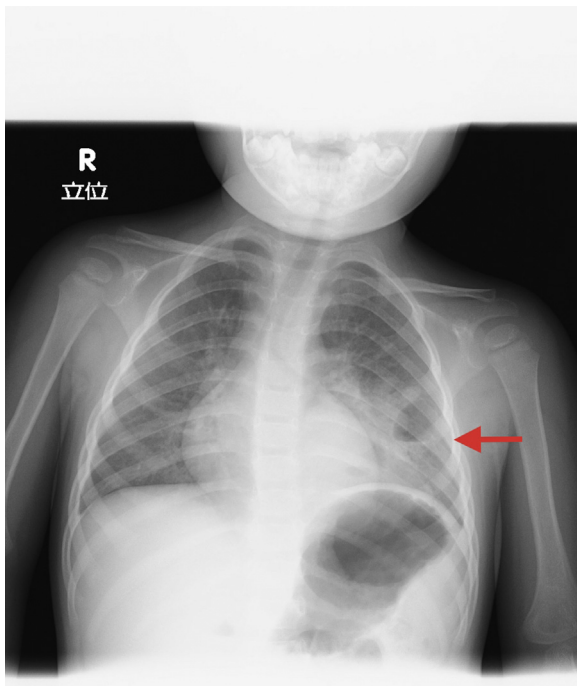
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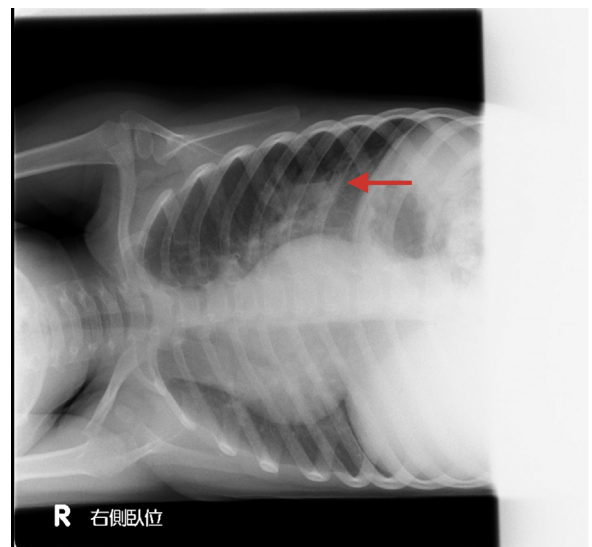
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A 3-year-old boy with no medical history was hospitalized after being diagnosed with pneumonia. He was administered parenteral ampicillin for 5 days and his treatment course was favorable; he

was discharged the next day and oral amoxicillin was continued. However, he developed a fever shortly after finishing the 10-day oral amoxicillin course, and presented to the emergency department again. A chest radiogram (posterior-anterior view; Fig. 1) showed air-fluid level in the left lower area that appeared to be freely mobile in the lateral decubitus view (Fig. 2), suggestive of an infected cyst due to a congenital anatomical malformation. After a 6-week antimicrobial course (ampicillin-sulbactam in first 3 weeks, followed by cefotaxime and clindamycin because he developed a fever and rash), a chest computed tomography scan (Fig. 3) showed multiple cystic lesions in the left lower lobe. One



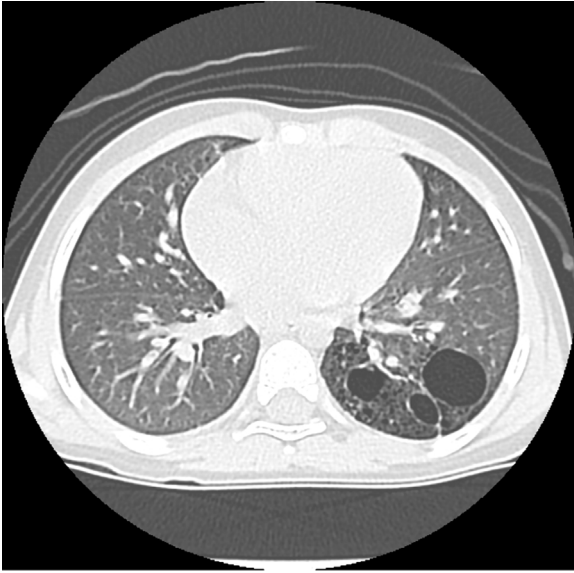
**Fig. 1.** A chest radiogram (posterior-anterior view) at admission showed air-fluid level (arrow) in the left lower area.



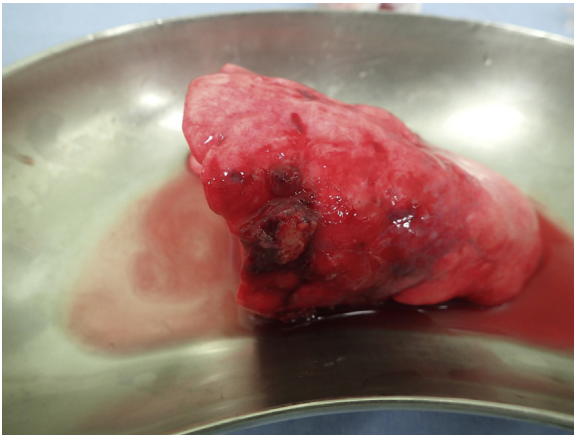
**Fig. 2.** A chest radiogram (lateral decubitus view) at admission showed freely mobile air-fluid level (arrow).

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**Fig. 3.** Computed tomography scan at convalescent phase showed multiple cystic lesions in the left lower lobe.



**Fig. 4.** Resected left lower lobe with multiple cystic lesions.

month later, he underwent a left lower lobectomy (Fig. 4), and a pathological diagnosis of congenital pulmonary airway malformation was made. In cases where children present with recurrent pneumonia, congenital anatomical malformations, such as cystic fibrosis, pulmonary sequestration, and congenital pulmonary airway malformation, should be considered [1,2,3]. Such malformations are generally managed with surgery and/or prophylactic antimicrobials.

### References

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