

Severe multilobar lung echinococcosis with multi-organ involvement in a child

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Abstract

Our case was a pediatric patient with very extensive lung involvement who also had involvement in other organs. We believe our case demonstrates clinical features that are complementary for the case series by Mfingwana L and colleagues and thus, will be beneficial for the readers.

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To the Editor;

We read with great curiosity the study by Mfingwana L and colleagues, in which they evaluated cases of pulmonary echinococcosis. In the study, the authors described 35 pediatric cases between ages 3-13 with lung involvement, of which 74% had single lobe involvement. Only 9 cases had exhibited multiple lobe involvement. Furthermore, 8 cases were reported to also have organ involvement beyond the lung, with majority exhibiting hepatic involvement.¹ Thus, patients presenting with symptoms associated with lung involvement should also be considered for involvement in other organs.

We would like to share a 16 year old pediatric case who presented to our clinic with solely a cough; following a clinical evaluation, the patient was diagnosed with severe multilobar lung echinococcosis. Although the patient only complained of a cough, chest radiograph and subsequent thorax CT imaging revealed several apparent multilobar cystic lesions (Figure 1a, 1b). Furthermore, IHA evaluation tested positive >1/1280 for echinococcosis antibodies.

Additional evaluation of the patient revealed echinococcosis cysts in the liver, spleen and kidneys (Figure 1e, 1c, 1d). The cysts in the liver and spleen were particularly vast and widespread. The renal involvement was especially significant in this case. Limited number of studies have reported renal involvement in pediatric cases.² In the study by Mfingwana L and colleagues, only 2 cases with lung involvement additionally had spleen involvement, while no case of renal involvement was observed. In the literature, renal involvement is reported in nearly 1-3% of echinococcosis cases.³ In our case; in addition to massive multilobar lung involvement, the patient clearly exhibited liver, spleen and kidney involvement.

The extent of such additional multi-organ involvement is extremely rare in pediatric case series. The case series by Mfingwana L and colleagues is very beneficial to clinicians for interpretation of the topic.

Our case was a pediatric patient with very extensive lung involvement who also had involvement in other organs. We believe our case demonstrates clinical features that are complementary for the case series by Mfingwana L and colleagues and thus, will be beneficial for the readers.

With much respects

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Figure Legend:

Figure 1a) PA akciğer grafisinde bilateral multipl sayıda nodüler opasiteler görülmektedir. Numerous bilateral nodular opacities are seen on the postero-anterior chest X-ray.

Figure 1b) Contrast unenhanced thorax computed tomography reveals multiple, nodular, well-circumscribed masses in bilateral lungs.

Figure 1c) Contrast-enhanced abdominal computed tomography shows multiple nodular cystic lesions involving all segments in the liver and nodular cystic lesions in the spleen (Both black arrows).

Figure 1d) Contrast-enhanced abdominal computed tomography shows a nodular cystic lesion in the left kidney (black arrow).

