A 4-year-old girl with tetralogy of Fallot had complete repair by open-heart surgery with patch closure of the ventricular septal defect, resection of the pulmonary valve, and placement of a transannular pericardial patch to enlarge the right ventricular outflow tract. On the day of discharge, a 2D echocardiogram revealed a small anterior pericardial effusion and a large pleural effusion, seen here by transthoracic echocardiogram (Figure 1) from a rotated parasternal long-axis view. Figure 2 shows a schematic of the echocardiogram. An atelectatic segment of the lung behind the right atrium looked like the uninflated lung of the fetus and permitted transmission of the ultrasound beam that is usually reflected by air-filled spaces. The white structure at the bottom of the frame represents the posterior chest wall. At the age of 4 years and 8 months, the patient weighed only 14.4 kg (third percentile for age). Note also the right ventricular hypertrophy and enlargement.

Figure 1. Rotated parasternal long-axis view demonstrates hypertrophied and enlarged right ventricle, dilated right atrium, an atelectatic segment of lung, and a large posterior pleural effusion and posterior chest wall in a 4-year-old patient after repair of tetralogy of Fallot.

Figure 2. Schematic of Figure 1. RV indicates right ventricle; RA, dilated right atrium; L, lung; PE, posterior pleural effusion; and CW, posterior chest wall.
Pleural Effusion on Transthoracic Echocardiogram

Linda B. Pauliks

Circulation. 1999;100:e47
doi: 10.1161/01.CIR.100.9.e47

Circulation is published by the American Heart Association, 7272 Greenville Avenue, Dallas, TX 75231
Copyright © 1999 American Heart Association, Inc. All rights reserved.
Print ISSN: 0009-7322. Online ISSN: 1524-4539

The online version of this article, along with updated information and services, is located on the
World Wide Web at:
http://circ.ahajournals.org/content/100/9/e47

Permissions: Requests for permissions to reproduce figures, tables, or portions of articles originally published
in Circulation can be obtained via RightsLink, a service of the Copyright Clearance Center, not the Editorial
Office. Once the online version of the published article for which permission is being requested is located,
click Request Permissions in the middle column of the Web page under Services. Further information about
this process is available in the Permissions and Rights Question and Answer document.

Reprints: Information about reprints can be found online at:
http://www.lww.com/reprints

Subscriptions: Information about subscribing to Circulation is online at:
http://circ.ahajournals.org//subscriptions/