usually suspected until there is difficulty weaning a patient off artificial ventilation. We found that ultrasound examination at the bedside was as effective as fluoroscopy in the diagnosis of a paralysed hemidiaphragm. Bedside examination facilitates early diagnosis and is of particular benefit in infants, when plication is often necessary to achieve extubation. There were no cases of paralysed right hemidiaphragm in our group, but we would not expect the diagnosis to be difficult with ultrasound because it is generally easier to image the right hemidiaphragm than the left. Bilateral palsy can be missed on fluoroscopic examination unless careful attention is given to the phases of respiration, because the two sides move in concert—albeit paradoxically. This error is less likely with ultrasound assessment because each hemidiaphragm is imaged independently. Ultrasound imaging of the left hemidiaphragm can be difficult in bigger children and adults, but diaphragmatic palsy is hardly ever the cause of major respiratory morbidity in this group and they rarely require plication.

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