Surgical treatment of postinfarction left ventricular aneurysm in 32 patients

Sir,

We read the paper by Dr. Donaldson and his colleagues on the surgical treatment of postinfarction left ventricular aneurysm with interest (Donaldson *et al.* (1976), 38, 1223).

The authors state that 'the angiographic criteria for the diagnosis of left ventricular aneurysm are not generally agreed and are unreliable'. This is because of the confusion in pathological nomenclature. While we agree that 'the left ventriculogram is not diagnostic' (alone) our experience indicates that the combination of typical coronary angiographic anatomy with a sizeable dyskinetic segment in its territory or supply is diagnostic. If the supplying vessel is totally occluded and fails to fill retrogradely (Raphael *et al.*, 1972) the surgeon will find a full thickness fibrous aneurysm bulging the exterior of the heart (Edwards, 1961), resection of which is likely to lead to symptomatic improvement. If the obstructed artery is patent beyond the block and fills retrogradely, or if its obstruction is less than complete then the infarct will not amount to an aneurysm but a transmural fibrous scar. This is not an aneurysm even when 'clearly delineated from the surrounding muscle'. As we do not yet know the prognosis of dyskinesia compared with aneurysm, the distinction should be maintained.

This point is made in Table 2. It shows that patients without total coronary occlusions had only small resections compared with patients who had

totally occluded arteries, and clinical improvement in the former group may have resulted from the other procedures that were carried out.

C. M. Oakley and M. J. Raphael,
Royal Postgraduate Medical School,
Hammersmith Hospital, London W12.

References

- Edwards, J. E. (1961). *An Atlas of Acquired Diseases of the Heart and Great Vessels*, Vol. II, p. 615. W. B. Saunders, Philadelphia.
Raphael, M. J., Steiner, R. E., Goodwin, J. F., and Oakley C. M. (1972). Cine-angiography of left ventricular aneurysms. *Clinical Radiology*, 23, 129-139.

This letter was shown to the authors who reply as follows.

Sir,

We are grateful to Dr. Oakley and Dr. Raphael for their observations on our paper. However, in our experience, the demonstration of retrograde filling of a vessel in the territory of a presumed aneurysm does not necessarily mean that the surgeon will not find a resectable aneurysm (by our definition). Our point is that the presence or absence of a resectable fibrous scar or aneurysm cannot be reliably predicted before operation, though the preoperative assessment is commonly correct.

R. Balcon and M. Honey,
London Chest Hospital,
London E2.