

Postexertional harlequin syndrome with spontaneous improvement

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DESCRIPTION

This man's episodes of unilateral sweating (figure 1), flushing and piloerection started after heavy physical work moving 20 tons of gravel. Harlequin syndrome may be due to an underlying defect in the region of the thoracic sympathetic outflow as discussed in the literature. Sudomotor and vasomotor sympathetic fibres exiting the spinal cord through the second and third thoracic roots have been implicated and it is conceivable that extreme exertion may have been

associated with arterial dissection and disruption of an anterior radicular artery at this level.¹ Thoracoscopic sympathectomy was considered but not performed and he did show spontaneous improvement over 3 years of follow-up.



Figure 1 A 51-year-old man reported right-sided episodic sweating, flushing and piloerection affecting his scalp, face, trunk and upper limb. This photograph was taken while resting on holiday in Spain and shows an absence of sweating over the left side of his scalp, with contralateral hyperhidrosis.

Learning points

- ▶ Harlequin syndrome is an unusual cause of unilateral loss of sweating, generally noticed by the patient because of contralateral flushing and hyperhidrosis.
- ▶ The onset can be after heavy exertion or trauma, raising the possibility of arterial dissection as the underlying cause.
- ▶ Harlequin syndrome is benign and may show spontaneous improvement over time, thus obviating the need for surgical intervention.

Competing interests None.

Patient consent Obtained.

Provenance and peer review Not commissioned; externally peer reviewed.

REFERENCE

- 1 Lance JW, Drummond PD, Gandevia SC, *et al.* Harlequin syndrome: the sudden onset of unilateral flushing and sweating. *J Neurol Neurosurg Psychiatry* 1988;51:635–42.

To cite: Emsley HCA. *BMJ Case Rep* Published online: [please include Day Month Year] doi:10.1136/bcr-2013-200516

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