Morel-Lavallée lesion in a male cyclist

Richard John Fawcett

DESCRIPTION
A 49-year-old man presented to his local emergency department (ED) 10 days after he had fallen off his bicycle in France. The man had fallen onto his left side while travelling at approximately 35 mph following a tyre blow out. He sustained a shearing type injury to his hip/flank area, resulting in a closed degloving injury. As the patient was able to resume cycling he did not seek prompt medical attention.

Over the following week, the patient reported increasing localised pain and a growing fluctuant swelling to his left hip area which stimulated him to seek medical help. On presentation there was no evidence of airway, breathing or circulatory problems. He walked with a mild antalgic gait and on examination had a large mass to his left flank, approximately 30 cm x 10 cm in size. The rest of his abdomen was soft and non-tender. An abdominal ultrasound scan (USS) revealed a large, predominantly anechoic fluid collection overlying the left gluteal muscles suggestive of a Morel-Lavallée lesion (figure 1).

This patient was managed with serial drainage of the lesion under USS guidance (figure 2) and compression bandaging within the ED. This was performed once a day for 4 consecutive days, (with compression bandaging in-between) until there was minimal fluid to aspirate, then the patient was left with compression for a further week. The patient responded well to treatment and is now asymptomatic.

Figure 1  Abdominal ultrasound scan showing the fluid collection overlying the left gluteal muscles extending laterally down to the level of the gluteal tendons near the greater trochanter. The collection is in deep subcutaneous fat, overlying the deep fascia measuring up to 20 cm x 4 cm.
Learning points

- Cyclists are a common group of patients who sustain this pattern of injury due to the separation of the superficial tissues from the underlying fat resulting from the shearing force incurred when they fall off and is regularly misdiagnosed as a simple haematoma.
- MRI is recommended by radiologists as the optimal way of looking for these lesions; however, ultrasound scan can also be used to excellent effect to define the nature and extent of these swellings.
- Treatment can be escalated from simple compression, serial aspiration, insertion of a surgical vacuum drain to surgical drainage/debridement and packing/sclerodesis.

Figure 2 Drainage of the Morel-Lavallée lesion using size 16 venflon. Over 800 mL was aspirated on day 1.

Competing interests None.
Patient consent Obtained.
Provenance and peer review Not commissioned; externally peer reviewed.

REFERENCES