Working as a concierge in a four-star hotel had become increasingly stressful for this 30-year-old overweight man with psoriasis, not least because the requisite black uniform highlighted the thick scale that flaked from his scalp, the unpredictable hours made regular application of creams almost impossible and smoking breaks were the only chance to leave the building in an 18-hour shift.

This environment only served to make his psoriasis worse. The itchy, burgundy-coloured, indurated plaques congregated around his shins and forearms with a thick, yellowing scale.

However, the area that caused him the most distress was his hands: the angry, erythematous palms with tense pustules, with scattered erythematous plaques on the dorsum, had begun to attract comments at work and had stopped him from socialising all together due to embarrassment. He had been using beclometasone 0.1 per cent ointment and emollients with salicylic acid, but had experienced little relief.

He had also been recently diagnosed with psoriatic arthritis particularly affecting his knees and hips and had been reviewed by rheumatology who had recommended methotrexate. Unfortunately, his liver function was deranged and therefore this option was excluded. He was seen in the dermatology clinic at which point his Psoriasis Area Severity Index (PASI) was 14.5 and Dermatology Life Quality Index (DLQI) 16, suggesting a significant skin involvement and impact of the psoriasis on his quality of life.

He was unable to attend phototherapy due to work commitments and was eligible for biological agents. He was therefore commenced on adalimumab (Humira). Three weeks after initiating treatment both his psoriatic plaques and joint pains had significantly improved. He continues to be monitored and six
months on his symptoms are well controlled with only small, persistent plaques on his shins.

Psoriasis is an inflammatory condition histologically characterised by epidermal hyperproliferation and abnormal keratinocyte differentiation. There is also neoangiogenesis within the affected plaques and cell turnover is increased from the normal three to four weeks to three to four days. It has a prevalence of around 2 per cent in adults within the UK and displays a variety of clinical phenotypes, most commonly plaque psoriasis.

It is an immune-mediated condition and TNF-alpha, dendritic cells and T-cells have been identified in the pathogenesis. There is a complex genetic component to the aetiology with multiple loci associated with the condition, and also environmental factors such as acute stress, beta-haemolytic streptococcal infections, local trauma, smoking and alcohol playing a role. For the majority of patients with psoriasis no obvious cause is found. In most cases sunlight improves psoriasis, but for some it can make it worse, particularly after sunburn.

The main cause of morbidity with psoriasis is the stigma that may be associated with the appearance of the lesions. This can significantly affect patients’ quality of life. Psoriasis can lead to avoidance of social interaction due to fear of rejection from others due to their appearance, and in some the psychological impact has been suggested to negatively impact their response to treatment.

Psoriasis has no cure but there are therapies to help relieve the features. Treatment options include topical agents, phototherapy, immunomodulatory medications and biologics.

Common topical treatments are vitamin D analogues, steroid ointments, tar preparations, salicylic acid and vitamin A analogues. Dithranol is effective in some cases, but it causes staining of all surfaces it touches and skin irritation and is therefore rarely used now. Topical calcineurin inhibitors may also be used in certain areas such as the face, folds or genitals.

Phototherapy may be administered as UVA with psoralen tablets, or as UVB. This requires hospital sessions usually three times per week with gradually increasing doses administered.

Immunomodulatory medications such as acitretin, methotrexate, hydroxy-carbam ide (unlicensed use) or ciclosporin may be considered if the disease is severe or extensive. They have an array of side-effects and require blood monitoring, and patients may need to continue topical treatment in addition.

Biological infusions such as adalimumab, etanercept (Enbrel), ustekinumab (Stelara) and infliximab (Remicade) are used for severe or resistant forms of psoriasis and have shown good results. They are, however, associated with a myriad of side-effects and patients are carefully selected to maximise benefit and minimise the risks of treatment.

The choice of treatment should be guided not only by the severity of disease but also by the likely impact of the treatment: it is pointless if the chosen therapy is more unbearable than the disease itself. The main goal in the treatment of psoriasis is to ameliorate patient discomfort, choosing treatments that target the areas affected and improve the individual’s overall quality of life.

References

By Dr Sophie Paget, an ST2 in medicine at Bristol Royal Infirmary

Readers are invited to send in similar interesting case histories to Prescriber, John Wiley & Sons, The Atrium, Southern Gate, Chichester, West Sussex PO19 8SQ, or e-mail prescriber@wiley.com. We pay £85 for those we publish.