## Appendix 7: Individual Patient Report 7: patient 7: female, 63 years old

Patient has small ulcer on the left lateral malleolar region. There are also two much smaller ulcers close by (see photo below). The main ulcer was very pain sensitive to mechanical stimuli and the patient has a lot of pain. The patient also complained of pain in the foot distal to the ulcer, radiating towards the toes. She had the ulcer for 4 years. It was previously larger and is now stable. The two smaller ulcers appeared approximately 9 months previously. Otherwise, no previous history of ulcers. No compression therapy, as not indicated (arterial insufficiency, see below).

*Peripheral blood pressure measurements:* greatly reduced toe pressures, lowest on right side indicating severe arterial insufficiency.

*Duplex (ultrasound) scanning:* left lower leg: great saphenous vein normal. Left femoral vein normal. Insufficient left popliteal and small saphenous veins. *Conclusion:* Insufficiency of left popliteal vein and small saphenous vein.

The ulcer responded well to wIRA therapy. However, after the 11<sup>th</sup> treatment, the patient became unwell due to the development of a secondary infection which was treated with antiobiotics, primarily with penicillin and thereafter with erythromycin, without effect. The left foot became very edematous and two new open ulcers developed on the lateral side of the ankle. Further wIRA treatment was stopped and the patient referred to the Department of Vascular Surgery. The patient received further treatment with antibiotics and anticoagulative therapy with compression garment treatment. In February 2005 the ulcer had still not healed.

This ulcer was regarded as not being a typical venous ulcer due to proven arterial insufficiency! This ulcer is therefore classified as a mainly arterial ulcer (arterial(+venous), a+v) (ulcer with the concomitant problem of arterial insufficiency) in Table 1 in the results section.

Total number of treatments: First treatment: Last treatment: Total treatment period: Smoker:

11 2003-01-28 2003-02-17 18 days yes



2003-01-27: first visit (1 day prior to first treatment) (infrared image on right)

Appendix 7 to: Mercer JB, Nielsen SP, Hoffmann G. Improvement of wound healing by water-filtered infrared-A (wIRA) in patients with chronic venous stasis ulcers of the lower legs including evaluation using infrared thermography. GMS Ger Med Sci. 2008;6:Doc11. Online available from: http://www.egms.de/en/gms/2008-6/000056.shtml

Progression of wound in the weeks following cessation of wIRA treatment



2003-02-24: approximately 4 days after start of secondary infection



2003-02-28

Appendix 7 to: Mercer JB, Nielsen SP, Hoffmann G. Improvement of wound healing by water-filtered infrared-A (wIRA) in patients with chronic venous stasis ulcers of the lower legs including evaluation using infrared thermography. GMS Ger Med Sci. 2008;6:Doc11. Online available from: http://www.egms.de/en/gms/2008-6/000056.shtml





2003-03-07





2003-03-21

**Note:** In all following figures showing results related to time, the grey shaded area represents the entire wIRA treatment period for this patient (i.e., the total time period between the first and the last treatment).



Ulcer size (patient 7)





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## Effect of treatment (patient 7's assessment)





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## Feeling of the wound area (patient 7's assessment)



Appendix 7 to: Mercer JB, Nielsen SP, Hoffmann G. Improvement of wound healing by water-filtered infrared-A (wIRA) in patients with chronic venous stasis ulcers of the lower legs including evaluation using infrared thermography. GMS Ger Med Sci. 2008;6:Doc11. Online available from: http://www.egms.de/en/gms/2008-6/000056.shtml