

## Abstract N°: 895

### Title: New methods of treatment for secondary hyperpigmentation spots in dermatology

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**Introduction.** Today, platelet-rich plasma is most frequently used in dermatology as an additional method of treatment for different types of alopecia, post-acne, acne, angioneurosis, acute and chronic ulcers with different etiology (diabetic, venous, traumatic, etc.), secondary hyperpigmentation spots and various cosmetic skin defects.

The blood plasma is able to provide a large amount of growth factors and various proteins that can stimulate the healing process. Plasma therapy accelerates neovascularization, increases blood supply and supply of nutrients necessary for cell regeneration in damaged tissue. Plasma therapy stimulates the proliferation and differentiation of cells involved in the healing process.

We used the intradermal injections of platelet-rich plasma (due to its potential in regenerative medicine) simultaneously with conventional treatment in patients with acute and chronic ulcers and secondary hyperpigmentation spots.

**The objective.** To study the clinical effectiveness of plasma therapy in patients with different types of alopecia, post-acne, acne, angioneurosis, acute and chronic ulcers with different etiology (diabetic, venous, traumatic, etc.), secondary hyperpigmentation spots and various cosmetic skin defects.

**Materials and methods.** We examined 12 patients with chronic ulcers (8 - main group, 4 - control group) and 10 patients with secondary hyperpigmentation spots (6 - main group, 4 - control group). The control group consisted of patients receiving conventional treatment. The patients in the main group received intradermal injections of their plasma. The plasma injections were administered up to 5 times with an interval of 10-14 days. Where necessary, the conventional treatment was additionally provided.

**Results.** A clinical improvement in regeneration processes, acceleration of epithelialization and healing of chronic ulcers, as well as lightening of hyperpigmentation spots were observed in all patients of the main group during treatment.

**Discussion.** Plasma therapy has a prominent place in regenerative medicine and is an effective and additional option of treatment for chronic ulcers and secondary hyperpigmentation spots. Platelet-rich blood plasma in treatment of patients with chronic ulcers and secondary hyperpigmentation spots can be considered as valuable adjuvant treatment.