

〈報 告〉

シワ評価法に関する検討 第2報 ——シワ石膏モデルを用いたシワ計測——

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Evaluation of Measurement Methodologies for Wrinkles on the Face Part II —Evaluation of measurement parameters for wrinkles using plaster models of wrinkles—

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Abstract

The accuracy and reliability of wrinkle parameters with different kinds of two dimensional image analysis and three dimensional optical profilometry methodologies were determined using a set of plaster models of wrinkles as a robust standard scale. Typical four parameters about wrinkle structure, proportion of wrinkle area (%), mean depth of wrinkles (μm), mean depth of the deepest wrinkle (μm) and deepest point on the deepest wrinkle (μm), of these plaster models were measured with these methods. As a result, absolute values of mean depth of wrinkles were severely varied among tested methods. Rank order of plaster models determined by measured values of these parameters was relevant with its order by visual grading, except a parameter of mean depth of wrinkle. Among tested parameters, the mean depth of the deepest wrinkle and deepest point on the deepest wrinkle showed significant difference with visual grading.

Key words: wrinkle, plaster model, image analysis, evaluating method.