Perceptual and automatic voice and speech analysis of chronic laryngitis and T1 vocal cord cancer.

Patients with chronic laryngitis and T1 vocal cord cancer were compared using perceptual and text-based objective voice and speech analyses in order to determine which group is more affected in its ability to communicate and whether a distinction between the two pathologies is possible. In all, 13 patients with histologically proven chronic laryngitis and 13 patients with T1 vocal cord cancer were compared perceptually by five speech therapists on the basis of seven criteria and objectively by a speech recognition system and prosodic analysis. Both, the data of the five speech therapists and the results of the automatic analysis revealed no significant differences between the two patient groups. A distinction between chronic laryngitis and T1 vocal cord carcinoma by mere voice and speech analysis is not possible, because the patient groups do not show significant differences in their voice quality.