

PROGNOSTIC FACTORS FOR CASTLEMAN DISEASE INCLUDE TUMOR DIAMETER, LYMPHOCYTE COUNT, ESTIMATED GLOMERULAR FILTRATION RATE AND LOW-DENSITY LIPOPROTEIN CHOLESTEROL: A RETROSPECTIVE COHORT STUDY

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INTRODUCTION

Castleman disease (CD) is a rare and highly heterogeneous lymph-proliferative disorder.

AIM

We aim to describe the clinical characteristics and identify prognostic factors from a large CD cohort over 11 years.

METHOD

CD diagnosed at Sun Yat-sen Memorial Hospital, Sun Yat-sen University from 2012 to 2022 were enrolled. General information, clinical manifestations, laboratory data, survival status of the patients were collected.

CONCLUSIONS

This study presents a large cohort depicting the varied clinical characteristics of CD, and the first report suggesting low-density lipoprotein cholesterol as a prognostic factor, providing novel insights for understanding CD.

RESULTS

Seventy-seven CD patients (mean age 38.8 years) were enrolled, with complicated disease manifestations, scattered departments of consultation. Compared to unicentric CD (UCD, 60 cases), multicentric CD (MCD, 17 cases) exhibited more severe clinical manifestations, stronger inflammation, and multi-system involvement. However, some UCD could also present with MCD-like systemic inflammatory manifestations. Multivariate COX analysis indicated that the adverse prognostic factors for overall survival were comprised by large tumor diameter in centimeter, decreased lymphocyte count, estimated glomerular filtration rate (eGFR) < 60 ml/min•1.73m², and low-density lipoprotein cholesterol < 2.11 mmol/L. To our knowledge, ours is the first study showing lower low-density lipoprotein cholesterol level is associated with poor prognosis of CD.

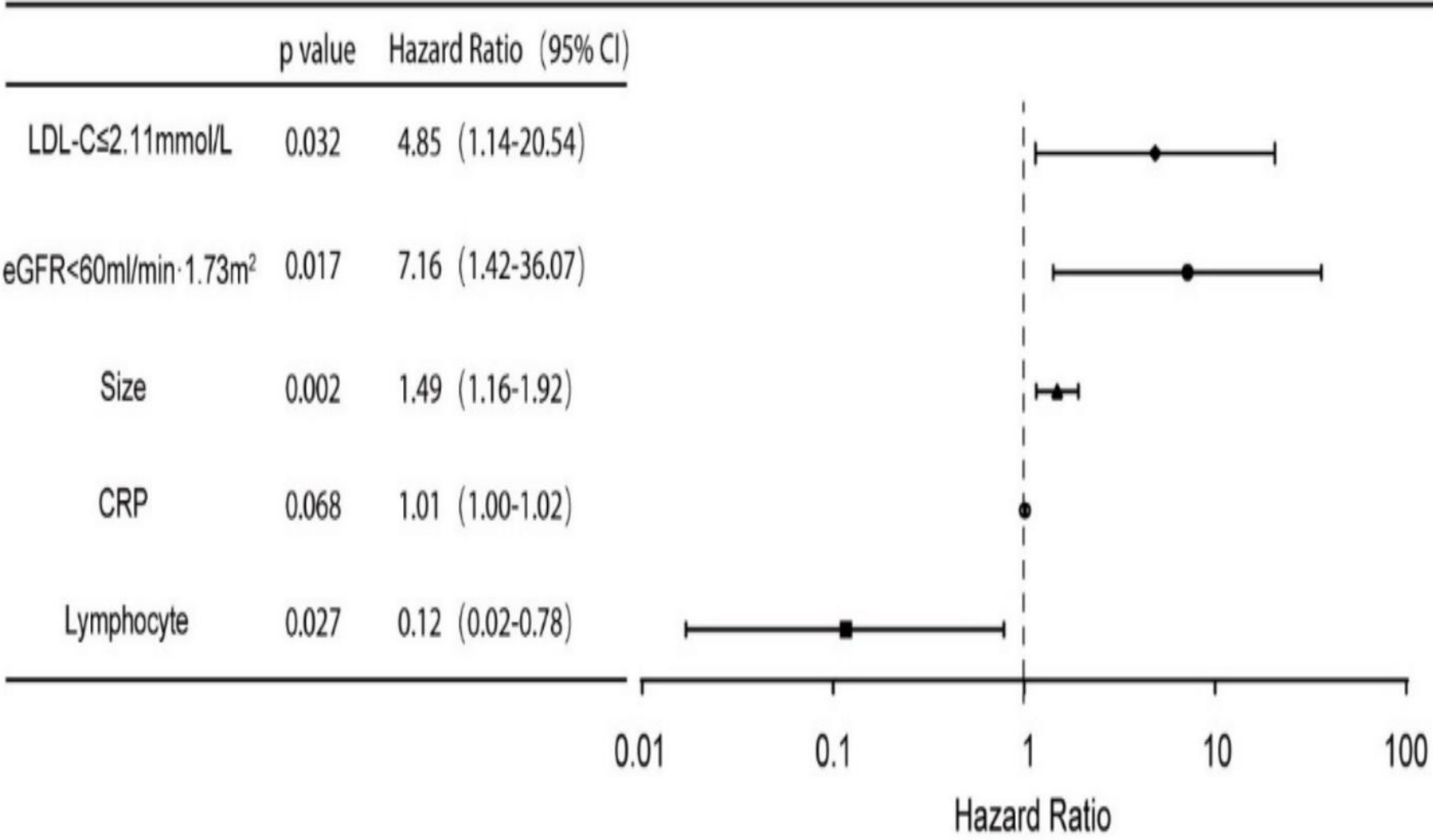


Fig 1. Forest plot of prognostic factors in patients with Castleman disease

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