Abstract

The objective of this bachelor thesis is to obtain and present basic knowledge of the icefall on the Krkonoše Mountains. Localization has been made by field surveys in selected areas. Height was measured using a laser rangefinder. Criteria for icefalls was fixed at least 4 m height and 4 m wide. Values for the altitude, the inclination of the surrounding slopes, orientation and height difference on the surface were calculated using morphometric analysis in ArcGis. The values were compared and discussed with regard to the relief. Another objective was to make a research of recent publication about the icefall theme and make regional physical characteristics connected to the ice forms. The number of detected icefalls is 49. The biggest concentration is in glacial trough the Labské údolí valley (30). Another areas are in glacial trough the Obří důl valley, around glacial lakes- Wielki and Mały Staw (7) and in the Velká Kotelní jáma cirque (2). Icefalls are located between 904 and 1345 m above mean sea level (average 1172 m). The maximum height of the icefall is 100m (average 36 m). The height difference on the surface range from 583 m to 740 m (avarage 637 m). The inclination of the surrounding slopes ranged from 18° to 39°. Icefalls are located on eastfacing sites with two branches east-northeast and east-southeast. These parameters are closely related with determination of icefalls to landforms transformed by glaciers (e.g., cirques, troughs)