This thesis presents an alternative approach for the Best Estimate of Liabilities (BEL) approximation in life insurance. The work summarizes the basic theoretical knowledge about reserving in life insurance and deterministic or stochastic projection of future cash flows which is a method commonly used to model the value of BEL. This thesis also presents the theory about durations. We use partial key rate durations to approximate the value of BEL. The proposed approach is tested on a real example life insurance product with profit share. The resulting approximations are close to real values and when partial durations obtained by deterministic calculations are used, the preparation of the approximation is not computationally demanding.