Abstract: The incidence of type 1 diabetes is increasing rapidly. Detecting the mechanisms underlying the autoimmune disease is a main goal of research. Studies investigating the pathogenesis of type 1 diabetes are working on the identification and characterization of exogenous, endogenous and genetic factors which induce or modify autoimmunity. Islet cell autoimmunity can be detected through screening for islet cell autoantibodies. This quantitative analysis allows the stratification of the individual risk for the development of type 1 diabetes. Prospective observational studies are most suitable to assess persons at risk, either because of the occurrence of type 1 diabetes in the family or because of a genotype associated with increased risk. Age-related factors which are analysed in observational studies include nutrition, increase in height and weight, childhood diseases and vaccinations as well as psychosocial aspects. Identification and characterization of these risk factors will serve as a basis for working on new approaches to prevent or to cure type 1 diabetes. Aim of this article is to provide an overview of the most relevant observational studies.